



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

100 N. Senate Avenue • Indianapolis, IN 46204

(800) 451-6027 • (317) 232-8603 • www.idem.IN.gov

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

To: Interested Parties

Date: June 25, 2015

From: Matthew Stuckey, Chief
Permits Branch
Office of Air Quality

Source Name: Metalworking Lubricants Co.

Permit Level: FESOP - Renewal

Permit Number: 097 - 32513 - 00139

Source Location: 1509 South Senate Avenue, Indianapolis, Indiana

Type of Action Taken: Permit Renewal

Notice of Decision: Approval - Effective Immediately

Please be advised that on behalf of the Commissioner of the Department of Environmental Management, I have issued a decision regarding the matter referenced above.

The final decision is available on the IDEM website at: <http://www.in.gov/apps/idem/caats/>
To view the document, select Search option 3, then enter permit 32513.

If you would like to request a paper copy of the permit document, please contact IDEM's central file room:

Indiana Government Center North, Room 1201
100 North Senate Avenue, MC 50-07
Indianapolis, IN 46204
Phone: 1-800-451-6027 (ext. 4-0965)
Fax (317) 232-8659

Pursuant to IC 13-15-5-3, this permit is effective immediately, unless a petition for stay of effectiveness is filed and granted according to IC 13-15-6-3, and may be revoked or modified in accordance with the provisions of IC 13-15-7-1.

(continues on next page)

If you wish to challenge this decision, IC 4-21.5-3 and IC 13-15-6-1 require that you file a petition for administrative review. This petition may include a request for stay of effectiveness and must be submitted to the Office of Environmental Adjudication, 100 North Senate Avenue, Government Center North, Suite N 501E, Indianapolis, IN 46204, **within eighteen (18) calendar days of the mailing of this notice**. The filing of a petition for administrative review is complete on the earliest of the following dates that apply to the filing:

- (1) the date the document is delivered to the Office of Environmental Adjudication (OEA);
- (2) the date of the postmark on the envelope containing the document, if the document is mailed to OEA by U.S. mail; or
- (3) The date on which the document is deposited with a private carrier, as shown by receipt issued by the carrier, if the document is sent to the OEA by private carrier.

The petition must include facts demonstrating that you are either the applicant, a person aggrieved or adversely affected by the decision or otherwise entitled to review by law. Please identify the permit, decision, or other order for which you seek review by permit number, name of the applicant, location, date of this notice and all of the following:

- (1) the name and address of the person making the request;
- (2) the interest of the person making the request;
- (3) identification of any persons represented by the person making the request;
- (4) the reasons, with particularity, for the request;
- (5) the issues, with particularity, proposed for considerations at any hearing; and
- (6) identification of the terms and conditions which, in the judgment of the person making the request, would be appropriate in the case in question to satisfy the requirements of the law governing documents of the type issued by the Commissioner.

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178. Callers from within Indiana may call toll-free at 1-800-451-6027, ext. 3-0178.



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

100 N. Senate Avenue • Indianapolis, IN 46204

(800) 451-6027 • (317) 232-8603 • www.idem.IN.gov

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

Federally Enforceable State Operating Permit Renewal OFFICE OF AIR QUALITY

**Metalworking Lubricants Company
1509 South Senate Avenue
Indianapolis, Indiana 46225**

(herein known as the Permittee) is hereby authorized to operate subject to the conditions contained herein, the source described in Section A (Source Summary) of this permit.


The Permittee must comply with all conditions of this permit. Noncompliance with any provisions of this permit is grounds for enforcement action; permit termination, revocation and reissuance, or modification; or denial of a permit renewal application. It shall not be a defense for the Permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. An emergency does constitute an affirmative defense in an enforcement action provided the Permittee complies with the applicable requirements set forth in Section B, Emergency Provisions.

This permit is issued in accordance with 326 IAC 2 and 40 CFR Part 70 Appendix A and contains the conditions and provisions specified in 326 IAC 2-8 as required by 42 U.S.C. 7401, et. seq. (Clean Air Act as amended by the 1990 Clean Air Act Amendments), 40 CFR Part 70.6, IC 13-15 and IC 13-17.

Indiana statutes from IC 13 and rules from 326 IAC, quoted in conditions in this permit, are those applicable at the time the permit was issued. The issuance or possession of this permit shall not alone constitute a defense against an alleged violation of any law, regulation or standard, except for the requirement to obtain a FESOP under 326 IAC 2-8.

Operation Permit No.: F097-32513-00139

Issued by:


Jenny Acker, Branch Chief
Permits Branch
Office of Air Quality

Issuance Date:

June 25, 2015

Expiration Date:

June 25, 2025

TABLE OF CONTENTS

SECTION A	SOURCE SUMMARY	5
A.1	General Information [326 IAC 2-8-3(b)]	
A.2	Source Definition [326 IAC 2-7-1(22)]	
A.3	Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]	
A.4	Specifically Regulated Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]	
A.5	Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]	
A.6	FESOP Applicability [326 IAC 2-8-2]	
SECTION B	GENERAL CONDITIONS	13
B.1	Definitions [326 IAC 2-8-1]	
B.2	Permit Term [326 IAC 2-8-4(2)][326 IAC 2-1.1-9.5][IC 13-15-3-6(a)]	
B.3	Term of Conditions [326 IAC 2-1.1-9.5]	
B.4	Enforceability [326 IAC 2-8-6][IC 13-17-12]	
B.5	Severability [326 IAC 2-8-4(4)]	
B.6	Property Rights or Exclusive Privilege [326 IAC 2-8-4(5)(D)]	
B.7	Duty to Provide Information [326 IAC 2-8-4(5)(E)]	
B.8	Certification [326 IAC 2-8-3(d)][326 IAC 2-8-4(3)(C)(i)][326 IAC 2-8-5(1)]	
B.9	Annual Compliance Certification [326 IAC 2-8-5(a)(1)]	
B.10	Compliance Order Issuance [326 IAC 2-8-5(b)]	
B.11	Preventive Maintenance Plan [326 IAC 1-6-3][326 IAC 2-8-4(9)][326 IAC 2-8-5(a)(1)]	
B.12	Emergency Provisions [326 IAC 2-8-12]	
B.13	Prior Permits Superseded [326 IAC 2-1.1-9.5]	
B.14	Termination of Right to Operate [326 IAC 2-8-9][326 IAC 2-8-3(h)]	
B.15	Permit Modification, Reopening, Revocation and Reissuance, or Termination [326 IAC 2-8-4(5)(C)][326 IAC 2-8-7(a)][326 IAC 2-8-8]	
B.16	Permit Renewal [326 IAC 2-8-3(h)]	
B.17	Permit Amendment or Revision [326 IAC 2-8-10][326 IAC 2-8-11.1]	
B.18	Operational Flexibility [326 IAC 2-8-15][326 IAC 2-8-11.1]	
B.19	Source Modification Requirement [326 IAC 2-8-11.1]	
B.20	Inspection and Entry [326 IAC 2-8-5(a)(2)][IC 13-14-2-2][IC 13-17-3-2][IC 13-30-3-1]	
B.21	Transfer of Ownership or Operational Control [326 IAC 2-8-10]	
B.22	Annual Fee Payment [326 IAC 2-7-19][326 IAC 2-8-4(6)][326 IAC 2-8-16][326 IAC 2-1.1-7]	
B.23	Credible Evidence [326 IAC 2-8-4(3)][326 IAC 2-8-5][62 FR 8314][326 IAC 1-1-6]	
SECTION C	SOURCE OPERATION CONDITIONS	23
	Emission Limitations and Standards [326 IAC 2-8-4(1)]	23
C.1	Particulate Emission Limitations For Processes with Process Weight Rates Less Than One Hundred (100) Pounds per Hour [326 IAC 6-3-2]	
C.2	Overall Source Limit [326 IAC 2-8]	
C.3	Opacity [326 IAC 5-1]	
C.4	Open Burning [326 IAC 4-1][IC 13-17-9]	
C.5	Incineration [326 IAC 4-2][326 IAC 9-1-2]	
C.6	Fugitive Dust Emissions [326 IAC 6-4]	
C.7	Stack Height [326 IAC 1-7]	
C.8	Asbestos Abatement Projects [326 IAC 14-10][326 IAC 18][40 CFR 61, Subpart M]	
	Testing Requirements [326 IAC 2-8-4(3)]	25
C.9	Performance Testing [326 IAC 3-6]	
	Compliance Requirements [326 IAC 2-1.1-11]	26
C.10	Compliance Requirements [326 IAC 2-1.1-11]	

Compliance Monitoring Requirements [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]	26
C.11 Compliance Monitoring [326 IAC 2-8-4(3)][326 IAC 2-8-5(a)(1)]	
C.12 Instrument Specifications [326 IAC 2-1.1-11][326 IAC 2-8-4(3)][326 IAC 2-8-5(1)]	
Corrective Actions and Response Steps [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]	26
C.13 Risk Management Plan [326 IAC 2-8-4][40 CFR 68]	
C.14 Response to Excursions or Exceedances [326 IAC 2-8-4][326 IAC 2-8-5]	
C.15 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-8-4][326 IAC 2-8-5]	
Record Keeping and Reporting Requirements [326 IAC 2-8-4(3)]	28
C.16 General Record Keeping Requirements[326 IAC 2-8-4(3)][326 IAC 2-8-5]	
C.17 General Reporting Requirements [326 IAC 2-8-4(3)(C)][326 IAC 2-1.1-11]	
Stratospheric Ozone Protection	29
C.18 Compliance with 40 CFR 82 and 326 IAC 22-1	
SECTION D.1 FACILITY OPERATION CONDITIONS	30
Emission Limitations and Standards [326 IAC 2-8-4(1)]	33
D.1.1 FESOP, PSD, Emission Offset ,and HAPs Minor Limits [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]	
D.1.2 Preventive Maintenance Plan [326 IAC 2-8-4(9)]	
Compliance Determination Requirement	35
D.1.3 Scrubber Operation [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]	
D.1.4 SO ₂ , VOC, and HAPs Control	
D.1.5 Testing Requirements [326 IAC 2-1.1-11]	
D.1.6 SO ₂ , VOC and HAPs Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]	
D.1.7 SO ₂ and VOC Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3]	
D.1.8 Total HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]	
D.1.9 Single HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]	
D.1.10 Continuous Emissions Monitoring [326 IAC 3-5][326 IAC 2-7-6(1),(6)]	
Compliance Monitoring Requirements [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]	40
D.1.11 Parametric Monitoring for Scrubber [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]	
D.1.12 Scrubber Failure Detection [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]	
D.1.13 Tank Temperature	
D.1.14 Parametric Monitoring - Hypochlorite Injection	
D.1.15 SO ₂ and VOC Continuous Emissions Monitoring (CEMS) Equipment Downtime	
Record Keeping and Reporting Requirement [326 IAC 2-8-4(3)][326 IAC 2-8-16]	41
D.1.16 Record Keeping Requirements [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]	
D.1.17 Reporting Requirements for CEMS [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]	
SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS	44
Emission Limitations and Standards [326 IAC 2-8-4(1)]	45
D.2.1 Particulate Emissions Limitation [326 IAC 6-2-4]	
D.2.2 Preventive Maintenance Plan [326 IAC 2-8-4(9)]	

SECTION E.1 NSPS	46
New Source Performance Standards (NSPS) Requirements [326 IAC 2-8-4(1)].....	46
E.1.1 General Provisions Relating to New Source Performance Standards [326 IAC 12-1][40 CFR Part 60, Subpart A]	
E.1.2 Small Industrial-Commercial-Institutional Steam Generating Units NSPS [326 IAC 12][40 CFR Part 60, Subpart Dc]	
CERTIFICATION	47
EMERGENCY OCCURRENCE REPORT	48
SEMI-ANNUAL NATURAL GAS FIRED BOILER CERTIFICATION	50
FESOP VOC Quarterly Report	51
FESOP SO2 Quarterly Report	52
FESOP SINGLE HAP Quarterly Report	53
FESOP TOTAL HAPs Quarterly Report.....	54
QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT	55
Attachment A: 40 CFR Part 60; NSPS for Small Industrial-Commercial-Institutional Steam Generating Units	

SECTION A

SOURCE SUMMARY

This permit is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ). The information describing the source contained in conditions A.1 through A.3 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Permittee to obtain additional permits or seek modification of this permit pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

A.1 General Information [326 IAC 2-8-3(b)]

The Permittee owns and operates a stationary waste oil recycling plant.

Source Address:	1509 South Senate Avenue, Indianapolis, Indiana 46225
General Source Phone Number:	(317) 269-2444
SIC Code:	2992
County Location:	Marion
Source Location Status:	Nonattainment for PM _{2.5} and SO ₂ Attainment for all other criteria pollutants
Source Status:	Federally Enforceable State Operating Permit Program Minor Source, under PSD and Emission Offset Rules; Minor Source, Section 112 of the Clean Air Act Not 1 of 28 Source Categories

A.2 Source Definition [326 IAC 2-7-1(22)]

IDEM, OAQ has examined whether the Metal Working Lubricants Company plant is part of the same major source with the Arrow Reload Systems Inc. These two plants are described as:

- (a) Metal Working Lubricants Company is located at 1509 South Senate Avenue, Indianapolis, Indiana 46225, Plant ID: 097-00139; and
- (b) One (1) railroad loadout, owned by Arrow Reload Systems Inc., located approximately at 1511 South Senate Avenue, Indianapolis, Indiana 46225, no Plant ID assigned.

In order to consider both plants as one (1) single "major source", pursuant to 326 IAC 2-7-1(22), all three of the following criteria must be met:

- (1) The plants must have common ownership or common control;
- (2) The plants must have the same two-digit Standard Industrial Classification (SIC) Code or one must serve as a support facility for the other; and
- (3) The plants must be located on the same, contiguous or adjacent properties.

Metal Working Lubricants Company is a distinct and separate corporate entity from Arrow Reload Systems Inc. The two companies share neither a common owner nor a common board of directors. Therefore, the plants are not under common ownership.

IDEM's Nonrule Policy Document Air-005 applies to the definition of "major source" in 326 IAC 2-7-1(22).

The guidance sets out two independent tests to determine if common control exists when there is no common ownership. The first test, the auxiliary activity test, determines whether one plant performs an auxiliary activity which directly serves the purpose of the primary activity and whether the owner or operator of the primary activity has a major role in the day-to-day operations of the auxiliary activity.

An auxiliary activity directly serves the purpose of a primary activity by supplying a necessary raw material to the primary activity or performing an integral part of the production process for the primary activity.

Day-to-day control of the auxiliary activity by the primary activity may be evidenced by several factors, including:

- is a majority of the output of the auxiliary activity provided to the primary activity?
- can the auxiliary activity contract to provide its products/services to a third-party without the consent of the primary activity?
- can the primary activity assume control of the auxiliary activity under certain circumstances?
- is the auxiliary activity required to complete periodic reports to the primary activity?

If one or a combination of these questions is answered affirmatively, common control may exist.

The railroad loadout was constructed by Arrow Reload System Inc. to facilitate the addition of liquids to the type of product that can be loaded and unloaded by Arrow Reload System Inc. The railroad spur that the loadout is located on is leased by Metal Working Lubricants from Arrow Reload System Inc. This railroad spur is located across the street from Metal Working Lubricants and is unavailable for use by any other person. Metal Working Lubricants operates the railroad loadout. All product unloaded from this location is sent only to Metal Working Lubricants. The Arrow Reload System Inc. loadout performs an auxiliary activity that directly serves Metal Working Lubricants. Therefore, the first common control test is met.

The second common control test is the but/for test. This test focuses on whether the auxiliary activity would exist absent the needs of the primary activity. If all or a majority of the output of the auxiliary activity is consumed by the primary activity the but/for test is satisfied. As stated above, all product unloaded is sent to Metal Working Lubricants. Therefore the second common control test is also met. The plants are under common control, meeting the first part of the major source definition.

The SIC Code Manual of 1987 outlines the procedure for determining the proper SIC Code for each type of business. More information about SIC Codes is available at http://www.osha.gov/pls/imis/sic_manual.html on the Internet. The Metal Working Lubricants Company plant has the two-digit SIC Code 29 for the Major Group Petroleum Refining and Related Industries. Arrow Reload Systems Inc., if a separate source, would have the two-digit SIC Code 40 for the Major Group Railroad Transportation. However, since the railroad loadout functions as part of the Metal Working Lubricants plant and serves no other plant or customer, it has the same SIC Code as Metal Working Lubricants. The two plants therefore share the same two-digit SIC Code.

A plant is a support facility to another plant if it dedicates 50% or more of its output to the other plant. In this case, 100% of the material unloaded from the railroad loadout is for the benefit of Metal Working Lubricants. Therefore the two plants do have a support facility relationship. Since the plants have the same two-digit SIC Code and have a support facility relationship, the plants meet the second part of the major source definition.

The two plants are located on properties separated by a right-of-way. The plants share a common property border on the right-of-way. The plants are therefore located on contiguous properties, meeting the third part of the major source definition. The plants meet all three parts of the major source definition. Therefore, IDEM, OAQ has determined that these two (2) plants will be considered one (1) major source, as defined by 326 IAC 2-7-1(22).

A.3 Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]

This stationary source consists of the following emission units and pollution control devices:

- (a) 350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas fired, identified as Emission Unit ID #1.
- (b) 600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas fired, identified as Emission Unit ID #2.
- (c) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
P1	14,055	June 2010	Steam Injection
P2	21,698	June 2010	Steam Injection
P3	21,698	1996	Steam Injection
P4	21,698	June 2010	Steam Injection
P5	21,698	June 2010	Steam Injection
P6	21,698	June 2010	Steam Injection
P7	21,698	June 2010	Steam Injection
P8	21,698	June 2010	Steam Injection
P9	21,698	March 2013	Steam Injection
P10	30,079	1996	Steam Injection
P11	30,079	1996	Steam Injection
P12	30,079	1996	Steam Injection
P13	30,079	1996	Steam Injection
P14	21,018	July 2003	Steam Injection
P15	21,536	July 2003	Steam Injection
SHT2	21,995	June 1991	Steam Injection

- (d) Heated Water tanks, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
W8	25,908	1996	Steam Injection

- (e) Heated Product tanks, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
D1	12,034	2005	Heat Exchanger
D2	11,664	1996	Heat Exchanger
D3	11,134	1996	Heat Exchanger
D4	17,164	1996	Heat Exchanger
D5	17,164	2001	Heat Exchanger

- (f) Heated Product tanks, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
K1	14,381	June 2012	Heat Exchanger
K2	16,073	July 2012	Heat Exchanger
K3	23,512	June 2011	Heat Exchanger

- (g) Heated Incoming Water Oil tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
W2	Outdoor	19,431	1996	Steam Injection
W3	Outdoor	17,842	1996	Steam Injection
W4	Outdoor	21,995	1996	Steam Injection
W5	Outdoor	21,995	1996	Steam Injection
W6	Outdoor	21,995	1996	Steam Injection
W7	Outdoor	21,995	1996	Steam Injection

- (h) Heated Waste Water tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
FET2	Outdoor	22,022	1996	Steam Injection
FET3	Outdoor	20,402	1996	Steam Injection
FET4	Outdoor	17,488	1996	Steam Injection

- (i) Heated Oil/Water separation tank venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
Big Pit	Indoor	60,000	pre-1993	Steam Injection

- (j) Heated Oil tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
M1	Indoor	1,151	1992	Heat Exchanger
M2	Indoor	7,637	January 2013	Heat Exchanger
M3	Indoor	6,175	1992	Heat Exchanger
M4	Indoor	7,637	1992	Heat Exchanger
M5	Indoor	7,637	1992	Heat Exchanger

- (k) Heated Blending and Storage tanks, blending of final product streams, venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
B10	Outdoor	15,545	pre-1993	Heat Exchanger
B14	Outdoor	11,848	pre-1993	Heat Exchanger
B19	Outdoor	18,459	pre-1993	Heat Exchanger
B20	Outdoor	11,335	pre-1993	Heat Exchanger

Tank	Vent to:	Size	Year Installed	Heat Source
B26	Outdoor	18,349	pre-1993	Heat Exchanger
B27	Outdoor	19,055	pre-1993	Heat Exchanger
B28	Outdoor	20,292	pre-1993	Heat Exchanger
B31	Outdoor	10,636	pre-1993	Heat Exchanger
B32	Outdoor	27,970	pre-1993	Heat Exchanger
B33	Outdoor	27,970	pre-1993	Heat Exchanger
B34	Outdoor	26,504	pre-1993	Heat Exchanger
B36	Outdoor	29,609	pre-1993	Heat Exchanger
B37	Outdoor	26,504	pre-1993	Heat Exchanger
B42	Outdoor	7,753	pre-1993	Heat Exchanger
B44	Outdoor	19,159	pre-1993	Heat Exchanger
B45	Outdoor	4,505	pre-1993	Heat Exchanger
B50	Outdoor	10,363	pre-1993	Heat Exchanger

(I) Unheated tanks for blending and storage of final product, venting to the atmosphere:

Tank	Vent to:	Size	Year Installed
B1	Outdoor	13,107	pre-1993
B11	Outdoor	4,505	pre-1993
B12	Outdoor	4,505	pre-1993
B13	Outdoor	4,505	pre-1993
B15	Outdoor	19,431	pre-1993
B16	Outdoor	16,075	pre-1993
B17	Outdoor	18,459	pre-1993
B18	Outdoor	18,459	pre-1993
B2	Outdoor	19,159	pre-1993
B21	Outdoor	5,710	pre-1993
B22	Outdoor	5,076	pre-1993
B23	Outdoor	5,076	pre-1993
B24	Outdoor	10,583	pre-1993
B25	Outdoor	18,897	pre-1993
B29	Outdoor	8,054	pre-1993
B3	Outdoor	19,159	pre-1993
B30	Outdoor	9,198	pre-1993
B35	Outdoor	29,609	pre-1993
B38	Outdoor	29,609	pre-1993
B39	Outdoor	29,609	pre-1993
B4	Outdoor	30,079	pre-1993
B40	Outdoor	7,010	pre-1993
B41	Outdoor	8,662	pre-1993
B43	Outdoor	7,423	pre-1993

Tank	Vent to:	Size	Year Installed
B46	Outdoor	21,995	pre-1993
B47	Outdoor	25,702	1996
B48	Outdoor	18,135	1996
B49	Outdoor	20,079	pre-1993
B50	Outdoor	19,107	pre-1993
B51	Outdoor	20,351	pre-1993
B52	Outdoor	30,455	pre-1993
B53	Outdoor	2,133	1993
B54	Outdoor	2,133	1993
B55	Outdoor	2,133	1993
B6	Outdoor	18,459	pre-1993
B7	Outdoor	19,755	pre-1993
B8	Outdoor	20,726	pre-1993
B9	Outdoor	19,159	pre-1993
B99	Outdoor	10,000	pre-1993

(m) Unheated Waste Water tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
A4	Outdoor	14,102	April 1997
C2	Outdoor	12,925	October 1992
C3	Outdoor	12,925	October 1992
FET1	Indoor	15,545	2003
Small Pit	Indoor	10,854	October 1993
Small Pit	Indoor	10,854	October 1993

(n) Unheated Additive Storage tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
Acid	Indoor	5,922	1996
Alum1	Indoor	5,264	2001
Alum2	Indoor	4,136	2001
Caustic	Indoor	6,862	1996
Coagulent	Indoor	7,520	2001
Polymer	Indoor	7,637	2001

(o) Unheated Product Storage tank venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
SHT1	Indoor	11,497	2000

- (p) Unheated Waste Oil Storage tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
ST10	Outdoor	30,079	1996
ST11	Outdoor	20,079	1996
ST13	Outdoor	11,658	1996
ST14	Outdoor	15,545	1996
ST3	Outdoor	21,374	1996
ST42	Outdoor	42,297	1996
ST5	Outdoor	25,908	1996
ST6	Outdoor	25,908	1996
ST9	Outdoor	19,431	1996

- (q) One (1) Hypochlorite Injection Scrubber, constructed in 1980, exhausting to stack S-01.

A.4 Specifically Regulated Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]

This stationary source also includes the following insignificant activities:

- (a) Natural gas-fired combustion sources with heat input equal to or less than ten (10) million Btu per hour:
- (1) Unit Heater - Maintenance, 0.130 MMBtu/hr.
 - (2) Storage Heater - Maintenance, 0.175 MMBtu/hr.
 - (3) Unit Heater 1 - Blending, 0.175 MMBtu/hr.
 - (4) Unit Heater 2 - Blending, 0.175 MMBtu/hr.;
 - (5) Unit Heater 3 - Blending, 0.175 MMBtu/hr.
 - (6) Make-up Unit - Blending, 0.175 MMBtu/hr.
 - (7) Unit Heater 1 - Water Treatment, 0.400 MMBtu/hr.
 - (8) Unit Heater 2 - Water Treatment, 0.130 MMBtu/hr.
 - (9) Unit Heater 3 - Water Treatment, 0.130 MMBtu/hr.;
 - (10) Make-up Unit - Water Treatment, 0.985 MMcf/hr.
 - (11) Individual Water Heater (temp.), 0.150 MMBtu/hr.
 - (12) Space Heater 1 - Office, 0.115 MMBtu/hr.
 - (13) Space Heater 2 - Office, 0.115 MMBtu/hr.;
 - (14) Space Heater 3 - Office, 0.130 MMBtu/hr..
- (b) One (1) portable air compressor with a maximum capacity of 5.5 HP, constructed in 2011.

- (c) One (1) diesel fired salamander, with a maximum capacity of 0.4 MMBtu/hr, constructed in 2005.
- (d) One (1) portable power washer with a diesel water heater, identified as Power Washer #1, with a maximum capacity of 0.4 MMBtu/hr, constructed in 1997.
- (e) One (1) portable power washer with a diesel water heater, identified as Power Washer #2, with a maximum capacity of 0.4 MMBtu/hr constructed in 2012.

A.5 Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]

This stationary source also includes the following insignificant activities:

- (a) Petroleum fuel dispensing facility, having a storage capacity of less than 10,500 gallons;
- (b) Vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids;
- (c) Activities associated with the treatment of wastewater streams with an oil and grease content less than or equal to one percent (1%) by volume;
- (d) Paved and unpaved roads and parking lots with public access;
- (e) Equipment used to collect any material that might be released during a malfunction, process upset, or spill cleanup, including catch tanks, temporary liquid separators, tanks, and fluid handling equipment;
- (f) Blowdown for any of the following: sight glasses, boilers, compressors, pumps;
- (g) A laboratory as defined in 326 IAC 2-7-1(21)(D), utilizing Freon (CFC 113) used in lab and recovered for reuse;
- (h) One (1) oxygen-acetylene cutting torch, identified as torch cutting operation, with a maximum capacity of 24 in/minute.
- (i) Three (3) welding stations with a maximum capacity of 310 lbs/yr.
 - (1) One (1) Miller Thunderbolt Stick welding station, identified as Welding Station #1, constructed in 1998.
 - (2) One (1) Miller Trailblazer Stick welding station powered by a 16 HP engine, identified as Welding Station #2, constructed in 1998.
 - (3) One (1) Lincoln Electric Weldanpower 225 G7 Stick welding station powered by a 16 HP engine, identified as Welding Station #3, constructed in 1993.
- (j) One (1) rail loading and unloading operation, constructed before 1996.
- (k) One (1) truck loading and unloading operation, constructed before 1996.

A.6 FESOP Applicability [326 IAC 2-8-2]

This stationary source, otherwise required to have a Part 70 permit as described in 326 IAC 2-7-2(a), has applied to the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ) to renew a Federally Enforceable State Operating Permit (FESOP).

B.1 Definitions [326 IAC 2-8-1]

B.2 Permit Term [326 IAC 2-8-4(2)][326 IAC 2-1.1-9.5][IC 13-15-3-6(a)]

- ### B.3 Term of Conditions [326 IAC 2-1.1-9.5]

(b) the emission unit to which the condition pertains permanently ceases operation.

B.5 Severability [326 IAC 2-8-4(4)]

B.6 Property Rights or Exclusive Privilege [326 IAC 2-8-4(5)(D)]

B.7 Duty to Provide Information [326 IAC 2-8-4(5)(E)]

- (a) The Permittee shall furnish to IDEM, OAQ, within a reasonable time, any information that IDEM, OAQ may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. Upon request, the Permittee shall also furnish to IDEM, OAQ copies of records required to be kept by this permit.
- (b) For information furnished by the Permittee to IDEM, OAQ, the Permittee may include a claim of confidentiality in accordance with 326 IAC 17.1. When furnishing copies of requested records directly to U. S. EPA, the Permittee may assert a claim of confidentiality in accordance with 40 CFR 2, Subpart B.

B.8 Certification [326 IAC 2-8-3(d)][326 IAC 2-8-4(3)(C)(i)][326 IAC 2-8-5(1)]

- (a) A certification required by this permit meets the requirements of 326 IAC 2-8-5(a)(1) if:
- (1) it contains a certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1), and
 - (2) the certification states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.
- (b) The Permittee may use the attached Certification Form, or its equivalent with each submittal requiring certification. One (1) certification may cover multiple forms in one (1) submittal.
- (c) An "authorized individual" is defined at 326 IAC 2-1.1-1(1).

B.9 Annual Compliance Certification [326 IAC 2-8-5(a)(1)]

- (a) The Permittee shall annually submit a compliance certification report which addresses the status of the source's compliance with the terms and conditions contained in this permit, including emission limitations, standards, or work practices. All certifications shall cover the time period from January 1 to December 31 of the previous year, and shall be submitted no later than July 1 of each year to:
- Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251
- (b) The annual compliance certification report required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (c) The annual compliance certification report shall include the following:
- (1) The appropriate identification of each term or condition of this permit that is the basis of the certification;
 - (2) The compliance status;
 - (3) Whether compliance was continuous or intermittent;
 - (4) The methods used for determining the compliance status of the source, currently and over the reporting period consistent with 326 IAC 2-8-4(3); and
 - (5) Such other facts, as specified in Sections D of this permit, as IDEM, OAQ may require to determine the compliance status of the source.

The submittal by the Permittee does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

B.10 Compliance Order Issuance [326 IAC 2-8-5(b)]

IDEM, OAQ may issue a compliance order to this Permittee upon discovery that this permit is in nonconformance with an applicable requirement. The order may require immediate compliance or contain a schedule for expeditious compliance with the applicable requirement.

B.11 Preventive Maintenance Plan [326 IAC 1-6-3][326 IAC 2-8-4(9)][326 IAC 2-8-5(a)(1)]

(a) A Preventive Maintenance Plan meets the requirements of 326 IAC 1-6-3 if it includes, at a minimum:

- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

The Permittee shall implement the PMPs.

(b) If required by specific condition(s) in Section D of this permit where no PMP was previously required, the Permittee shall prepare and maintain Preventive Maintenance Plans (PMPs) no later than ninety (90) days after issuance of this permit or ninety (90) days after initial start-up, whichever is later, including the following information on each facility:

- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;
- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

If, due to circumstances beyond the Permittee's control, the PMPs cannot be prepared and maintained within the above time frame, the Permittee may extend the date an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The PMP extension notification does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

The Permittee shall implement the PMPs.

(c) A copy of the PMPs shall be submitted to IDEM, OAQ upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions.

The PMPs and their submittal do not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (d) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

B.12 Emergency Provisions [326 IAC 2-8-12]

- (a) An emergency, as defined in 326 IAC 2-7-1(12), is not an affirmative defense for an action brought for noncompliance with a federal or state health-based emission limitation except as provided in 326 IAC 2-8-12.
- (b) An emergency, as defined in 326 IAC 2-7-1(12), constitutes an affirmative defense to an action brought for noncompliance with a health-based or technology-based emission limitation if the affirmative defense of an emergency is demonstrated through properly signed, contemporaneous operating logs or other relevant evidence that describe the following:

- (1) An emergency occurred and the Permittee can, to the extent possible, identify the causes of the emergency;
- (2) The permitted facility was at the time being properly operated;
- (3) During the period of an emergency, the Permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards or other requirements in this permit;
- (4) For each emergency lasting one (1) hour or more, the Permittee notified IDEM, OAQ within four (4) daytime business hours after the beginning of the emergency, or after the emergency was discovered or reasonably should have been discovered;

Telephone Number: 1-800-451-6027 (ask for Office of Air Quality, Compliance and Enforcement Branch), or
Telephone Number: 317-233-0178 (ask for Office of Air Quality Compliance and Enforcement Branch)
Facsimile Number: 317-233-6865

- (5) For each emergency lasting one (1) hour or more, the Permittee submitted the attached Emergency Occurrence Report Form or its equivalent, either by mail or facsimile to:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

within two (2) working days of the time when emission limitations were exceeded due to the emergency.

The notice fulfills the requirement of 326 IAC 2-8-4(3)(C)(ii) and must contain the following:

- (A) A description of the emergency;

- (B) Any steps taken to mitigate the emissions; and
- (C) Corrective actions taken.

The notification which shall be submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (6) The Permittee immediately took all reasonable steps to correct the emergency.
- (c) In any enforcement proceeding, the Permittee seeking to establish the occurrence of an emergency has the burden of proof.
- (d) This emergency provision supersedes 326 IAC 1-6 (Malfunctions). This permit condition is in addition to any emergency or upset provision contained in any applicable requirement.
- (e) The Permittee seeking to establish the occurrence of an emergency shall make records available upon request to ensure that failure to implement a PMP did not cause or contribute to an exceedance of any limitations on emissions. However, IDEM, OAQ may require that the Preventive Maintenance Plans required under 326 IAC 2-8-3(c)(6) be revised in response to an emergency.
- (f) Failure to notify IDEM, OAQ by telephone or facsimile of an emergency lasting more than one (1) hour in accordance with (b)(4) and (5) of this condition shall constitute a violation of 326 IAC 2-8 and any other applicable rules.
- (g) Operations may continue during an emergency only if the following conditions are met:
 - (1) If the emergency situation causes a deviation from a technology-based limit, the Permittee may continue to operate the affected emitting facilities during the emergency provided the Permittee immediately takes all reasonable steps to correct the emergency and minimize emissions.
 - (2) If an emergency situation causes a deviation from a health-based limit, the Permittee may not continue to operate the affected emissions facilities unless:
 - (A) The Permittee immediately takes all reasonable steps to correct the emergency situation and to minimize emissions; and
 - (B) Continued operation of the facilities is necessary to prevent imminent injury to persons, severe damage to equipment, substantial loss of capital investment, or loss of product or raw material of substantial economic value.

Any operations shall continue no longer than the minimum time required to prevent the situations identified in (g)(2)(B) of this condition.

B.13 Prior Permits Superseded [326 IAC 2-1.1-9.5]

- (a) All terms and conditions of permits established prior to F097-32519-00139 and issued pursuant to permitting programs approved into the state implementation plan have been either:

- (1) incorporated as originally stated,
- (2) revised, or
- (3) deleted.

(b) All previous registrations and permits are superseded by this permit.

B.14 Termination of Right to Operate [326 IAC 2-8-9][326 IAC 2-8-3(h)]

The Permittee's right to operate this source terminates with the expiration of this permit unless a timely and complete renewal application is submitted at least nine (9) months prior to the date of expiration of the source's existing permit, consistent with 326 IAC 2-8-3(h) and 326 IAC 2-8-9.

**B.15 Permit Modification, Reopening, Revocation and Reissuance, or Termination
[326 IAC 2-8-4(5)(C)][326 IAC 2-8-7(a)][326 IAC 2-8-8]**

- (a) This permit may be modified, reopened, revoked and reissued, or terminated for cause. The filing of a request by the Permittee for a Federally Enforceable State Operating Permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any condition of this permit. [326 IAC 2-8-4(5)(C)] The notification by the Permittee does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (b) This permit shall be reopened and revised under any of the circumstances listed in IC 13-15-7-2 or if IDEM, OAQ determines any of the following:
 - (1) That this permit contains a material mistake.
 - (2) That inaccurate statements were made in establishing the emissions standards or other terms or conditions.
 - (3) That this permit must be revised or revoked to assure compliance with an applicable requirement. [326 IAC 2-8-8(a)]
- (c) Proceedings by IDEM, OAQ to reopen and revise this permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. Such reopening and revision shall be made as expeditiously as practicable. [326 IAC 2-8-8(b)]
- (b) The reopening and revision of this permit, under 326 IAC 2-8-8(a), shall not be initiated before notice of such intent is provided to the Permittee by IDEM, OAQ at least thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, OAQ may provide a shorter time period in the case of an emergency. [326 IAC 2-8-8(c)]

B.16 Permit Renewal [326 IAC 2-8-3(h)]

- (a) The application for renewal shall be submitted using the application form or forms prescribed by IDEM, OAQ and shall include the information specified in 326 IAC 2-8-3. Such information shall be included in the application for each emission unit at this source, except those emission units included on the trivial or insignificant activities list contained in 326 IAC 2-7-1(21) and 326 IAC 2-7-1(42). The renewal application does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

Request for renewal shall be submitted to:

Indiana Department of Environmental Management
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

- (b) A timely renewal application is one that is:
- (1) Submitted at least nine (9) months prior to the date of the expiration of this permit; and
 - (2) If the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (c) If the Permittee submits a timely and complete application for renewal of this permit, the source's failure to have a permit is not a violation of 326 IAC 2-8 until IDEM, OAQ takes final action on the renewal application, except that this protection shall cease to apply if, subsequent to the completeness determination, the Permittee fails to submit by the deadline specified, pursuant to 326 IAC 2-8-3(g), in writing by IDEM, OAQ any additional information identified as being needed to process the application.

B.17 Permit Amendment or Revision [326 IAC 2-8-10][326 IAC 2-8-11.1]

- (a) Permit amendments and revisions are governed by the requirements of 326 IAC 2-8-10 or 326 IAC 2-8-11.1 whenever the Permittee seeks to amend or modify this permit.
- (b) Any application requesting an amendment or modification of this permit shall be submitted to:
- Indiana Department of Environmental Management
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251
- Any such application does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-8-10(b)(3)]

B.18 Operational Flexibility [326 IAC 2-8-15][326 IAC 2-8-11.1]

- (a) The Permittee may make any change or changes at the source that are described in 326 IAC 2-8-15(b) and (c) without a prior permit revision, if each of the following conditions is met:
- (1) The changes are not modifications under any provision of Title I of the Clean Air Act;
 - (2) Any approval required by 326 IAC 2-8-11.1 has been obtained;

- (3) The changes do not result in emissions which exceed the limitations provided in this permit (whether expressed herein as a rate of emissions or in terms of total emissions);

- (4) The Permittee notifies the:

Indiana Department of Environmental Management
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

United States Environmental Protection Agency, Region V
Air and Radiation Division, Regulation Development Branch - Indiana (AR-18J)
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

in advance of the change by written notification at least ten (10) days in advance of the proposed change. The Permittee shall attach every such notice to the Permittee's copy of this permit; and

- (5) The Permittee maintains records on-site, on a rolling five (5) year basis, which document all such changes and emission trades that are subject to 326 IAC 2-8-15(b)(1) and (c). The Permittee shall make such records available, upon reasonable request, for public review.

Such records shall consist of all information required to be submitted to IDEM, OAQ in the notices specified in 326 IAC 2-8-15(b)(1) and (c).

- (b) Emission Trades [326 IAC 2-8-15(b)]
The Permittee may trade emissions increases and decreases at in the source, where the applicable SIP provides for such emission trades without requiring a permit revision, subject to the constraints of Section (a) of this condition and those in 326 IAC 2-8-15(b).
- (c) Alternative Operating Scenarios [326 IAC 2-8-15(c)]
The Permittee may make changes at the source within the range of alternative operating scenarios that are described in the terms and conditions of this permit in accordance with 326 IAC 2-8-4(7). No prior notification of IDEM, OAQ, or U.S. EPA is required.
- (d) Backup fuel switches specifically addressed in, and limited under, Section D of this permit shall not be considered alternative operating scenarios. Therefore, the notification requirements of part (a) of this condition do not apply.

B.19 Source Modification Requirement [326 IAC 2-8-11.1]

A modification, construction, or reconstruction is governed by the requirements of 326 IAC 2.

B.20 Inspection and Entry [326 IAC 2-8-5(a)(2)][IC 13-14-2-2][IC 13-17-3-2][IC13-30-3-1]

Upon presentation of proper identification cards, credentials, and other documents as may be required by law, and subject to the Permittee's right under all applicable laws and regulations to assert that the information collected by the agency is confidential and entitled to be treated as such, the Permittee shall allow IDEM, OAQ, U.S. EPA or an authorized representative to perform the following:

- (a) Enter upon the Permittee's premises where a FESOP source is located, or emissions related activity is conducted, or where records must be kept under the conditions of this permit;
- (b) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit;
- (c) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, inspect, at reasonable times, any facilities, equipment (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit;
- (d) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, sample or monitor, at reasonable times, substances or parameters for the purpose of assuring compliance with this permit or applicable requirements; and
- (e) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, utilize any photographic, recording, testing, monitoring, or other equipment for the purpose of assuring compliance with this permit or applicable requirements.

B.21 Transfer of Ownership or Operational Control [326 IAC 2-8-10]

- (a) The Permittee must comply with the requirements of 326 IAC 2-8-10 whenever the Permittee seeks to change the ownership or operational control of the source and no other change in the permit is necessary.
- (b) Any application requesting a change in the ownership or operational control of the source shall contain a written agreement containing a specific date for transfer of permit responsibility, coverage and liability between the current and new Permittee. The application shall be submitted to:

Indiana Department of Environmental Management
Permit Administration and Support Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

Any such application does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (c) The Permittee may implement administrative amendment changes addressed in the request for an administrative amendment immediately upon submittal of the request. [326 IAC 2-8-10(b)(3)]

B.22 Annual Fee Payment [326 IAC 2-7-19][326 IAC 2-8-4(6)][326 IAC 2-8-16][326 IAC 2-1.1-7]

- (a) The Permittee shall pay annual fees to IDEM, OAQ no later than thirty (30) calendar days of receipt of a billing. Pursuant to 326 IAC 2-7-19(b), if the Permittee does not receive a bill from IDEM, OAQ the applicable fee is due April 1 of each year.
- (b) Failure to pay may result in administrative enforcement action, or revocation of this permit.
- (c) The Permittee may call the following telephone numbers: 1-800-451-6027 or 317-233-4230 (ask for OAQ, Billing, Licensing, and Training Section), to determine the appropriate permit fee.

B.23 Credible Evidence [326 IAC 2-8-4(3)][326 IAC 2-8-5][62 FR 8314][326 IAC 1-1-6]

For the purpose of submitting compliance certifications or establishing whether or not the Permittee has violated or is in violation of any condition of this permit, nothing in this permit shall preclude the use, including the exclusive use, of any credible evidence or information relevant to whether the Permittee would have been in compliance with the condition of this permit if the appropriate performance or compliance test or procedure had been performed.

SECTION C

SOURCE OPERATION CONDITIONS

Entire Source

Emission Limitations and Standards [326 IAC 2-8-4(1)]

C.1 Particulate Emission Limitations For Processes with Process Weight Rates Less Than One Hundred (100) Pounds per Hour [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from any process not exempt under 326 IAC 6-3-1(b) or (c) which has a maximum process weight rate less than 100 pounds per hour and the methods in 326 IAC 6-3-2(b) through (d) do not apply shall not exceed 0.551 pounds per hour.

C.2 Overall Source Limit [326 IAC 2-8]

The purpose of this permit is to limit this source's potential to emit to less than major source levels for the purpose of Section 502(a) of the Clean Air Act.

(a) Pursuant to 326 IAC 2-8:

- (1) The potential to emit any regulated pollutant, except particulate matter (PM) and greenhouse gases (GHGs), from the entire source shall be limited to less than one-hundred (100) tons per twelve (12) consecutive month period.
- (2) The potential to emit any individual hazardous air pollutant (HAP) from the entire source shall be limited to less than ten (10) tons per twelve (12) consecutive month period; and
- (3) The potential to emit any combination of HAPs from the entire source shall be limited to less than twenty-five (25) tons per twelve (12) consecutive month period.
- (4) The potential to emit greenhouse gases (GHGs) from the entire source shall be limited to less than one hundred thousand (100,000) tons of CO₂ equivalent emissions (CO₂e) per twelve (12) consecutive month period.

(b) Pursuant to 326 IAC 326 IAC 2-2 (PSD), potential to emit particulate matter (PM) from the entire source shall be limited to less than one hundred (100) tons per twelve (12) consecutive month period.

(c) This condition shall include all emission points at this source including those that are insignificant as defined in 326 IAC 2-7-1(21). The source shall be allowed to add insignificant activities not already listed in this permit, provided that the source's potential to emit does not exceed the above specified limits.

(d) Section D of this permit contains independently enforceable provisions to satisfy this requirement.

C.3 Opacity [326 IAC 5-1]

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1 (Applicability) and 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:

- (a) Opacity shall not exceed an average of thirty percent (30%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.

- (b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

C.4 Open Burning [326 IAC 4-1][IC 13-17-9]

The Permittee shall not open burn any material except as provided in 326 IAC 4-1-3, 326 IAC 4-1-4 or 326 IAC 4-1-6. The previous sentence notwithstanding, the Permittee may open burn in accordance with an open burning approval issued by the Commissioner under 326 IAC 4-1-4.1.

C.5 Incineration [326 IAC 4-2][326 IAC 9-1-2]

The Permittee shall not operate an incinerator except as provided in 326 IAC 4-2 or in this permit. The Permittee shall not operate a refuse incinerator or refuse burning equipment except as provided in 326 IAC 9-1-2 or in this permit.

C.6 Fugitive Dust Emissions [326 IAC 6-4]

The Permittee shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6.

C.7 Stack Height [326 IAC 1-7]

The Permittee shall comply with the applicable provisions of 326 IAC 1-7 (Stack Height Provisions), for all exhaust stacks through which a potential (before controls) of twenty-five (25) tons per year or more of particulate matter or sulfur dioxide is emitted.

C.8 Asbestos Abatement Projects [326 IAC 14-10][326 IAC 18][40 CFR 61, Subpart M]

- (a) Notification requirements apply to each owner or operator. If the combined amount of regulated asbestos containing material (RACM) to be stripped, removed or disturbed is at least 260 linear feet on pipes or 160 square feet on other facility components, or at least thirty-five (35) cubic feet on all facility components, then the notification requirements of 326 IAC 14-10-3 are mandatory. All demolition projects require notification whether or not asbestos is present.
- (b) The Permittee shall ensure that a written notification is sent on a form provided by the Commissioner at least ten (10) working days before asbestos stripping or removal work or before demolition begins, per 326 IAC 14-10-3, and shall update such notice as necessary, including, but not limited to the following:
 - (1) When the amount of affected asbestos containing material increases or decreases by at least twenty percent (20%); or
 - (2) If there is a change in the following:
 - (A) Asbestos removal or demolition start date;
 - (B) Removal or demolition contractor; or
 - (C) Waste disposal site.
- (c) The Permittee shall ensure that the notice is postmarked or delivered according to the guidelines set forth in 326 IAC 14-10-3(2).
- (d) The notice to be submitted shall include the information enumerated in 326 IAC 14-10-3(3).

All required notifications shall be submitted to:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (e) **Procedures for Asbestos Emission Control**
The Permittee shall comply with the applicable emission control procedures in 326 IAC 14-10-4 and 40 CFR 61.145(c). Per 326 IAC 14-10-1, emission control requirements are applicable for any removal or disturbance of RACM greater than three (3) linear feet on pipes or three (3) square feet on any other facility components or a total of at least 0.75 cubic feet on all facility components.
- (f) **Demolition and Renovation**
The Permittee shall thoroughly inspect the affected facility or part of the facility where the demolition or renovation will occur for the presence of asbestos pursuant to 40 CFR 61.145(a).
- (g) **Indiana Licensed Asbestos Inspector**
The Permittee shall comply with 326 IAC 14-10-1(a) that requires the owner or operator, prior to a renovation/demolition, to use an Indiana Licensed Asbestos Inspector to thoroughly inspect the affected portion of the facility for the presence of asbestos.

Testing Requirements [326 IAC 2-8-4(3)]

C.9 Performance Testing [326 IAC 3-6]

- (a) For performance testing required by this permit. A test protocol, except as provided elsewhere in this permit, shall be submitted to:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

no later than thirty-five (35) days prior to the intended test date. The protocol submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual test date. The notification submitted by the Permittee does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (c) Pursuant to 326 IAC 3-6-4(b), all test reports must be received by IDEM, OAQ not later than forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAQ if the Permittee submits to IDEM, OAQ, a reasonable written explanation not later than five (5) days prior to the end of the initial forty-five (45) day period.

Compliance Requirements [326 IAC 2-1.1-11]

C.10 Compliance Requirements [326 IAC 2-1.1-11]

The commissioner may require stack testing, monitoring, or reporting at any time to assure compliance with all applicable requirements by issuing an order under 326 IAC 2-1.1-11. Any monitoring or testing shall be performed in accordance with 326 IAC 3 or other methods approved by the commissioner or the U. S. EPA.

Compliance Monitoring Requirements [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]

C.11 Compliance Monitoring [326 IAC 2-8-4(3)][326 IAC 2-8-5(a)(1)]

- (a) For new units:
Unless otherwise specified in the approval for the new emission unit(s), compliance monitoring for new emission units shall be implemented on and after the date of initial start-up.
- (b) For existing units:
Unless otherwise specified in this permit, for all monitoring requirements not already legally required, the Permittee shall be allowed up to ninety (90) days from the date of permit issuance to begin such monitoring. If, due to circumstances beyond the Permittee's control, any monitoring equipment required by this permit cannot be installed and operated no later than ninety (90) days after permit issuance, the Permittee may extend the compliance schedule related to the equipment for an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

in writing, prior to the end of the initial ninety (90) day compliance schedule, with full justification of the reasons for the inability to meet this date.

The notification which shall be submitted by the Permittee does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

C.12 Instrument Specifications [326 IAC 2-1.1-11][326 IAC 2-8-4(3)][326 IAC 2-8-5(1)]

- (a) When required by any condition of this permit, an analog instrument used to measure a parameter related to the operation of an air pollution control device shall have a scale such that the expected maximum reading for the normal range shall be no less than twenty percent (20%) of full scale. The analog instrument shall be capable of measuring values outside of the normal range.
- (b) The Permittee may request that the IDEM, OAQ approve the use of an instrument that does not meet the above specifications provided the Permittee can demonstrate that an alternative instrument specification will adequately ensure compliance with permit conditions requiring the measurement of the parameters.

Corrective Actions and Response Steps [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]

C.13 Risk Management Plan [326 IAC 2-8-4][40 CFR 68]

If a regulated substance, as defined in 40 CFR 68, is present at a source in more than a threshold quantity, the Permittee must comply with the applicable requirements of 40 CFR 68.

C.14 Response to Excursions or Exceedances [326 IAC 2-8-4][326 IAC 2-8-5]

Upon detecting an excursion where a response step is required by the D Section or an exceedance of a limitation in this permit:

- (a) The Permittee shall take reasonable response steps to restore operation of the emissions unit (including any control device and associated capture system) to its normal or usual manner of operation as expeditiously as practicable in accordance with good air pollution control practices for minimizing excess emissions.
- (b) The response shall include minimizing the period of any startup, shutdown or malfunction. The response may include, but is not limited to, the following:
 - (1) initial inspection and evaluation;
 - (2) recording that operations returned or are returning to normal without operator action (such as through response by a computerized distribution control system); or
 - (3) any necessary follow-up actions to return operation to normal or usual manner of operation.
- (c) A determination of whether the Permittee has used acceptable procedures in response to an excursion or exceedance will be based on information available, which may include, but is not limited to, the following:
 - (1) monitoring results;
 - (2) review of operation and maintenance procedures and records; and/or
 - (3) inspection of the control device, associated capture system, and the process.
- (d) Failure to take reasonable response steps shall be considered a deviation from the permit.
- (e) The Permittee shall record the reasonable response steps taken.

C.15 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-8-4][326 IAC 2-8-5]

- (a) When the results of a stack test performed in conformance with Section C - Performance Testing, of this permit exceed the level specified in any condition of this permit, the Permittee shall submit a description of its response actions to IDEM, OAQ no later than seventy-five (75) days after the date of the test.
- (b) A retest to demonstrate compliance shall be performed no later than one hundred eighty (180) days after the date of the test. Should the Permittee demonstrate to IDEM, OAQ that retesting in one-hundred eighty (180) days is not practicable, IDEM, OAQ may extend the retesting deadline.
- (c) IDEM, OAQ reserves the authority to take any actions allowed under law in response to noncompliant stack tests.

The response action documents submitted pursuant to this condition do require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

Record Keeping and Reporting Requirements [326 IAC 2-8-4(3)]

C.16 General Record Keeping Requirements[326 IAC 2-8-4(3)][326 IAC 2-8-5]

- (a) Records of all required monitoring data, reports and support information required by this permit shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. Support information includes the following, where applicable:
- (AA) All calibration and maintenance records.
 - (BB) All original strip chart recordings for continuous monitoring instrumentation.
 - (CC) Copies of all reports required by the FESOP.

Records of required monitoring information include the following, where applicable:

- (AA) The date, place, as defined in this permit, and time of sampling or measurements.
- (BB) The dates analyses were performed.
- (CC) The company or entity that performed the analyses.
- (DD) The analytical techniques or methods used.
- (EE) The results of such analyses.
- (FF) The operating conditions as existing at the time of sampling or measurement.

These records shall be physically present or electronically accessible at the source location for a minimum of three (3) years. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.

- (b) Unless otherwise specified in this permit, for all record keeping requirements not already legally required, the Permittee shall be allowed up to ninety (90) days from the date of permit issuance or the date of initial start-up, whichever is later, to begin such record keeping.

C.17 General Reporting Requirements [326 IAC 2-8-4(3)(C)][326 IAC 2-1.1-11]

- (a) The Permittee shall submit the attached Quarterly Deviation and Compliance Monitoring Report or its equivalent. Proper notice submittal under Section B - Emergency Provisions satisfies the reporting requirements of this paragraph. Any deviation from permit requirements, the date(s) of each deviation, the cause of the deviation, and the response steps taken must be reported except that a deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report. This report shall be submitted not later than thirty (30) days after the end of the reporting period. The Quarterly Deviation and Compliance Monitoring Report shall include a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1). A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit.

- (b) The address for report submittal is:
- Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251
- (c) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (d) Reporting periods are based on calendar years, unless otherwise specified in this permit. For the purpose of this permit "calendar year" means the twelve (12) month period from January 1 to December 31 inclusive.

Stratospheric Ozone Protection

C.18 Compliance with 40 CFR 82 and 326 IAC 22-1

Pursuant to 40 CFR 82 (Protection of Stratospheric Ozone), Subpart F, except as provided for motor vehicle air conditioners in Subpart B, the Permittee shall comply with applicable standards for recycling and emissions reduction.

SECTION D.1

FACILITY OPERATION CONDITIONS

Emissions Unit Description:

- (c) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
P1	14,055	June 2010	Steam Injection
P2	21,698	June 2010	Steam Injection
P3	21,698	1996	Steam Injection
P4	21,698	June 2010	Steam Injection
P5	21,698	June 2010	Steam Injection
P6	21,698	June 2010	Steam Injection
P7	21,698	June 2010	Steam Injection
P8	21,698	June 2010	Steam Injection
P9	21,698	March 2013	Steam Injection
P10	30,079	1996	Steam Injection
P11	30,079	1996	Steam Injection
P12	30,079	1996	Steam Injection
P13	30,079	1996	Steam Injection
P14	21,018	July 2003	Steam Injection
P15	21,536	July 2003	Steam Injection
SHT2	21,995	June 1991	Steam Injection

- (d) Heated Water tanks, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
W8	25,908	1996	Steam Injection

- (e) Heated Product tanks, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
D1	12,034	2005	Heat Exchanger
D2	11,664	1996	Heat Exchanger
D3	11,134	1996	Heat Exchanger
D4	17,164	1996	Heat Exchanger
D5	17,164	2001	Heat Exchanger

- (f) Heated Product tanks, with emissions controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
K1	14,381	June 2012	Heat Exchanger
K2	16,073	July 2012	Heat Exchanger
K3	23,512	June 2011	Heat Exchanger

(g) Heated Incoming Water Oil tanks venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
W2	19,431	1996	Steam Injection
W3	17,842	1996	Steam Injection
W4	21,995	1996	Steam Injection
W5	21,995	1996	Steam Injection
W6	21,995	1996	Steam Injection
W7	21,995	1996	Steam Injection
(h) Heated Waste Water tanks venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
FET2	22,022	1996	Steam Injection
FET3	20,402	1996	Steam Injection
FET4	17,488	1996	Steam Injection
(i) Heated Oil/Water separation tank venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
Big Pit	60,000	pre-1993	Steam Injection
(j) Heated Oil tanks venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
M1	1,151	1992	Heat Exchanger
M2	7,637	January 2013	Heat Exchanger
M3	6,175	1992	Heat Exchanger
M4	7,637	1992	Heat Exchanger
M5	7,637	1992	Heat Exchanger
(k) Heated Blending and Storage tanks, blending of final product streams, venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
B10	15,545	pre-1993	Heat Exchanger
B14	11,848	pre-1993	Heat Exchanger
B19	18,459	pre-1993	Heat Exchanger
B20	11,335	pre-1993	Heat Exchanger
B26	18,349	pre-1993	Heat Exchanger
B27	19,055	pre-1993	Heat Exchanger
B28	20,292	pre-1993	Heat Exchanger
B31	10,636	pre-1993	Heat Exchanger
B32	27,970	pre-1993	Heat Exchanger
B33	27,970	pre-1993	Heat Exchanger
B34	26,504	pre-1993	Heat Exchanger
B36	29,609	pre-1993	Heat Exchanger
B37	26,504	pre-1993	Heat Exchanger
B42	7,753	pre-1993	Heat Exchanger
B44	19,159	pre-1993	Heat Exchanger
B45	4,505	pre-1993	Heat Exchanger
B50	10,363	pre-1993	Heat Exchanger

(l) Unheated tanks for blending and storage of final product, venting to the atmosphere:			
Tank	Vent to:	Size	Year Installed
B1	Outdoor	13,107	pre-1993
B11	Outdoor	4,505	pre-1993
B12	Outdoor	4,505	pre-1993
B13	Outdoor	4,505	pre-1993
B15	Outdoor	19,431	pre-1993
B16	Outdoor	16,075	pre-1993
B17	Outdoor	18,459	pre-1993
B18	Outdoor	18,459	pre-1993
B2	Outdoor	19,159	pre-1993
B21	Outdoor	5,710	pre-1993
B22	Outdoor	5,076	pre-1993
B23	Outdoor	5,076	pre-1993
B24	Outdoor	10,583	pre-1993
B25	Outdoor	18,897	pre-1993
B29	Outdoor	8,054	pre-1993
B3	Outdoor	19,159	pre-1993
B30	Outdoor	9,198	pre-1993
B35	Outdoor	29,609	pre-1993
B38	Outdoor	29,609	pre-1993
B39	Outdoor	29,609	pre-1993
B4	Outdoor	30,079	pre-1993
B40	Outdoor	7,010	pre-1993
B41	Outdoor	8,662	pre-1993
B43	Outdoor	7,423	pre-1993
B46	Outdoor	21,995	pre-1993
B47	Outdoor	25,702	1996
B48	Outdoor	18,135	1996
B49	Outdoor	20,079	pre-1993
B50	Outdoor	19,107	pre-1993
B51	Outdoor	20,351	pre-1993
B52	Outdoor	30,455	pre-1993
B53	Outdoor	2,133	1993
B54	Outdoor	2,133	1993
B55	Outdoor	2,133	1993
B6	Outdoor	18,459	pre-1993
B7	Outdoor	19,755	pre-1993
B8	Outdoor	20,726	pre-1993
B9	Outdoor	19,159	pre-1993
B99	Outdoor	10,000	pre-1993
(m) Unheated Waste Water tanks venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
A4	Outdoor	14,102	April 1997
C2	Outdoor	12,925	October 1992
C3	Outdoor	12,925	October 1992
FET1	Indoor	15,545	2003
Small Pit	Indoor	10,854	October 1993
Small Pit	Indoor	10,854	October 1993

(n) Unheated Additive Storage tanks venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
Acid	Indoor	5,922	1996
Alum1	Indoor	5,264	2001
Alum2	Indoor	4,136	2001
Caustic	Indoor	6,862	1996
Coagulent	Indoor	7,520	2001
Polymer	Indoor	7,637	2001
(o) Unheated Product Storage tank venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
SHT1	Indoor	11,497	2000
(p) Unheated Waste Oil Storage tanks venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
ST10	Outdoor	30,079	1996
ST11	Outdoor	20,079	1996
ST13	Outdoor	11,658	1996
ST14	Outdoor	15,545	1996
ST3	Outdoor	21,374	1996
ST42	Outdoor	42,297	1996
ST5	Outdoor	25,908	1996
ST6	Outdoor	25,908	1996
ST9	Outdoor	19,431	1996
(q) One (1) Hypochlorite Injection Scrubber, constructed in 1980, exhausting to stack S-01.			
(The information describing the process contained in this emissions unit description box is descriptive information and does not constitute enforceable conditions.)			

Emission Limitations and Standards [326 IAC 2-8-4(1)]

D.1.1 FESOP, PSD, Emission Offset ,and HAPs Minor Limits [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]

Pursuant to 326 IAC 2-8-4 (FESOP) and in order to render the requirements of 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants), 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) and 326 IAC 2-3 (Emission Offset) not applicable, the permittee shall comply with the following:

- (a) VOC, HAPs and SO₂ emissions from the following tanks shall be controlled by the Hypochlorite Injection Scrubber.

Tank	Size	Year Installed
<i>Heated Production Tanks</i>		
P1	14,055	June 2010
P2	21,698	June 2010
P3	21,698	1996
P4	21,698	June 2010
P5	21,698	June 2010
P6	21,698	June 2010
P7	21,698	June 2010

Tank	Size	Year Installed
<u>Heated Production Tanks</u>		
P8	21,698	June 2010
P9	21,698	March 2013
P10	30,079	1996
P11	30,079	1996
P12	30,079	1996
P13	30,079	1996
P14	21,018	July 2003
P15	21,536	July 2003
SHT2	21,995	June 1991
<u>Heated Water Tanks</u>		
W8	25,908	1996
<u>Heated Product Tanks</u>		
D1	12,034	2005
D2	11,664	1996
D3	11,134	1996
D4	17,164	1996
D5	17,164	2001
<u>Heated Product Tanks</u>		
K1	14,381	June 2012
K2	16,073	July 2012
K3	23,512	June 2011

- (b) The temperature of each tank routed to the Hypochlorite Injection Scrubber shall not exceed 210°F (99°C).
- (c) VOC emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (d) Emissions of any single HAP from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed nine (9) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (e) Total HAPs emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed twenty-four (24) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (f) Total SO₂ emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall be less than ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

Compliance with these limits, combined with the potential to emit of SO₂, VOC and HAPs from all other units at the source, shall limit the source-wide potential to emit of SO₂ and VOC, each, to less than hundred (100) tons per twelve (12) consecutive month period, a single HAP to less than ten (10) tons per twelve (12) consecutive month period, and the total HAPs to less than twenty-five (25) tons per twelve (12) consecutive month period and shall render the requirements of 326 IAC 2-7 (Part 70 Permit Program) 326 IAC 2-2 (PSD), 326 IAC 2-3 (Emission Offset), and 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants) not applicable.

D.1.2 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan is required for these facilities and any control devices. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

Compliance Determination Requirement

D.1.3 Scrubber Operation [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

The scrubber shall be in operation when P1, P2, P3, P4, P5, P6, P7, P8, P9, P10, P11, P12, P13, P14, P15, SHT2, W8, D1, D2, D3, D4, D5, K1, K2, and K3 are in operation.

D.1.4 SO₂, VOC, and HAPs Control

In order to ensure compliance with Condition D.1.1, the scrubber system serving the tanks for SO₂, VOC, and HAP control shall be in operation and control emissions from the tanks at all times the tanks are operating or holding liquid.

D.1.5 Testing Requirements [326 IAC 2-1.1-11]

- (a) Not later than 180 days after the issuance date of this permit, Permit No F097-32513-00139, the Permittee shall perform VOC (including emission rate, removal efficiency, and capture efficiency) testing of the scrubber system utilizing methods approved by the commissioner at least once every 2.5 years from the date of the most recent valid compliance demonstration.
- (b) Not later than 180 days after the issuance date of this permit, Permit No F097-32513-00139, the Permittee shall perform HAPs (including emission rate, removal efficiency, and capture efficiency) testing of the scrubber system commissioner at least once every 2.5 years from the date of the most recent valid compliance demonstration. Testing shall be conducted for the HAP used at the source that has the lowest destruction efficiency, as estimated by the source and approved by IDEM.
- (c) Not later than 180 days after the issuance date of this permit, Permit No F097-32513-00139, the Permittee shall perform SO₂ (including emission rate, removal efficiency, and capture efficiency) testing of the scrubber system utilizing methods approved by the commissioner at least once every 2.5 years from the date of the most recent valid compliance demonstration.

Testing shall be conducted in accordance with the provisions of 326 IAC 3-6 (Source Sampling Procedures). Section C – Performance Testing contains the Permittee's obligation with regard to the performance testing required by this condition.

D.1.6 SO₂, VOC and HAPs Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]

Compliance with the SO₂, VOC and HAPs limits in Condition D.1.1 shall be determined as follows:

- (a) The Permittee shall determine the sulfur, VOC and HAPs content of each shipment of waste product received by the following:
 - (1) Providing vendor analysis of waste product delivered, if accompanied by a vendor certification, or;
 - (2) The shipment of waste product received shall be sampled and analyzed by an independent laboratory, utilizing the appropriate American Society for Testing and Materials (ASTM) standards for sampling and chemical analysis. Sampling and analysis shall be conducted as follows:

- (A) The sample acquisition points shall be at locations where representative samples of the respective material shipments may be obtained.
 - (B) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.
 - (C) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.
- (b) The Permittee shall determine the sulfur, VOC and HAPs content of each additive used in the processing of waste received by the following:
 - (1) Providing vendor analysis of additive, if accompanied by a vendor certification, or material safety data sheets (MSDS), or;
 - (2) The shipment of additive shall be sampled and analyzed by an independent laboratory, utilizing the appropriate American Society for Testing and Materials (ASTM) standards for sampling and chemical analysis. Sampling and analysis shall be conducted as follows:
 - (A) The sample acquisition points shall be at locations where representative samples of the respective additive may be obtained.
 - (B) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.
 - (C) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.
- (c) If the amount of sulfur, VOC, and HAPs in final product (oil) is deducted from the monthly SO₂, VOC, or HAPs emissions, the Permittee shall determine the sulfur, VOC and HAP content of each tank of final product (oil) prior to shipment by the following:
 - (1) On-Site Sampling; or,
 - (A) Each tank of final product (oil) shall be tested on-site utilizing the same American Society for Testing and Materials (ASTM) standards for sampling and chemical analysis conducted for the waste oil received shipments or an alternative method approved by IDEM, OAQ. Sampling and analysis shall be conducted as follows:
 - (i) The sample acquisition points shall be at locations where representative samples of the respective material shipments may be obtained.
 - (ii) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.
 - (iii) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.
 - (2) Each tank of final product (oil) received shall be sampled and analyzed by an independent laboratory, utilizing the appropriate American Society for Testing

and Materials (ASTM) standards for sampling and chemical analysis. Sampling and analysis shall be conducted as follows:

- (A) The sample acquisition points shall be at locations where representative samples of the respective material shipments may be obtained.
 - (B) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.
 - (C) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.
- (c) In lieu of determining the HAPs content of the waste oil received or additives, the source may treat the entire VOC content as a single HAP.

D.1.7 SO₂ and VOC Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3]

- (a) The Permittee shall determine the calendar month SO₂ emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with the following methodology using the input values determined in D.1.6 above:

$$SO_2 = \left[\left(\sum_{i=1}^N SULFUR_{RECEIVED(i)} + \sum_{i=1}^N SULFUR_{ADDITIVES(i)} \right) \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} - \left(\left(SO_2_{EMITTED} / \left(1 - \frac{CE_{SO_2}}{100} \right) \right) - SO_2_{EMITTED} \right) - \left(\sum_{i=1}^N SULFUR_{SHIPPED(i)} \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} \right) \right] \div 2,000 \frac{\text{lbs}}{\text{ton}}$$

Where:

- SO₂ = SO₂ emitted (tons/month)
- SULFUR_{RECEIVED} = Sulfur content of each shipment of waste product received for each month (lbs Sulfur/shipment)
- SULFUR_{ADDITIVES} = Sulfur content of additive used for each month (lbs Sulfur/lb additive)
- SO_{2EMITTED} = SO₂ emitted from the scrubber as determined by the SO₂ CEMS (lbs SO₂/month)
- CE_{SO₂} = Overall SO₂ control efficiency of the scrubber (including emission rate, removal efficiency, and capture efficiency)
- SULFUR_{SHIPPED} = Sulfur content of each shipment of final product (lbs Sulfur/shipment)

- (1) CE_{SO₂} shall be equal to 90% unless a lower value is established during the latest compliance demonstration.
- (2) In lieu of deducting the amount of sulfur contained in the final product (oil) (SULFUR_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

- (b) The Permittee shall determine the calendar month VOC emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with the following methodology using the input values determined in D.1.6 above:

$$VOC = \left[\left\{ \sum_{i=1}^N VOC_{RECEIVED(i)} + \sum_{i=1}^N VOC_{ADDITIVES(i)} \right\} - \left(\left\{ VOC_{EMITTED} / \left(1 - \frac{CE_{SO_2}}{100} \right) \right\} - VOC_{EMITTED} \right) - \left[\sum_{i=1}^N VOC_{SHIPPED(i)} \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} \right] \right] \div 2,000 \frac{\text{lbs}}{\text{ton}}$$

Where:

VOC	=	VOC emitted (tons/month)
VOC _{RECEIVED}	=	VOC content of each shipment of waste product received for each month (lbs VOC/shipment)
VOC _{ADDITIVES}	=	VOC content of additive used for each month (lbs VOC/lb additive)
VOC _{EMITTED}	=	VOC emitted from the scrubber as determined by the VOC CEMS (lbs VOC/month)
CE _{VOC}	=	Overall VOC control efficiency of the scrubber (including emission rate, removal efficiency, and capture efficiency)
VOC _{SHIPPED}	=	VOC content of each shipment of final product (lbs VOC/shipment)

- (1) CE_{VOC} shall be equal to 90% unless a lower value was established during the latest compliance demonstration.
- (2) In lieu of deducting the amount of VOC contained in the final product (oil) (VOC_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

D.1.8 Total HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]

The Permittee shall determine the calendar month total HAPs emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with one of the following methodologies using the input values determined in D.1.6 above:

- (a)

$$HAPs = \left[\sum_{x=1}^N \left(\sum_{i=1}^N HAP(x)_{RECEIVED(i)} + \sum_{i=1}^N HAP(x)_{ADDITIVES(i)} - \sum_{i=1}^N HAP(x)_{SHIPPED(i)} \right) \right] / \left[2,000 \frac{\text{lbs}}{\text{ton}} \right]$$

Where:

HAPs	=	Total HAPs emitted (tons/month)
HAPs _{RECEIVED}	=	Total HAPs content of each shipment of waste product received for each month (lbs Total HAPs/shipment)
HAPs _{ADDITIVES}	=	Total HAP content of additive used for each month (lbs Total HAP/lb additive)
HAPs _{SHIPPED}	=	Total HAPs content of each shipment of final product (lbs Total HAPs/shipment)

- (1) In lieu of deducting the amount of total HAPS contained in the final product (oil) (HAPS_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).
- (b) In lieu of determining total HAPs emissions in accordance with paragraph (a) of this condition, the Permittee may count all VOCs as Volatile Hazardous Air Pollutants (VHAPs) and determine the total HAPs emissions in accordance with the following methodology using the input values determined in D.1.6 above:

$$VOC = \left[\left\{ \sum_{i=1}^N VOC_{RECEIVED(i)} + \sum_{i=1}^N VOC_{ADDITIVES(i)} \right\} - \left(\left\{ VOC_{EMITTED} / \left(1 - \frac{CE_{SO2}}{100} \right) \right\} - VOC_{EMITTED} \right) - \left[\sum_{i=1}^N VOC_{SHIPPED(i)} \times \frac{2 \text{ lb SO}_2}{\text{lb Sulfur}} \right] \right] \div 2,000 \frac{\text{lbs}}{\text{ton}}$$

Where:

- | | | |
|---------------------------|---|---|
| VHAPs | = | Total HAPs emitted (tons/month) |
| VHAP _{RECEIVED} | = | VOC content of each shipment of waste product received for each month (lbs VOC/shipment) |
| VHAP _{ADDITIVES} | = | VOC content of additive used for each month (lbs VOC/lb additive) |
| VHAP _{EMITTED} | = | VOC emitted from the scrubber as determined by the VOC CEMS (lbs VOC/month) |
| CE _{VHAP} | = | Overall VHAP control efficiency of the scrubber (including emission rate, removal efficiency, and capture efficiency) |
| VHAP _{SHIPPED} | = | VOC content of each shipment of final product (lbs VOC/shipment) |
- (1) CE_{VHAP} shall be equal to 80% unless a lower value was established during the latest compliance demonstration.
 - (2) In lieu of deducting the amount of VOC contained in the final product (oil) (VHAP_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

D.1.9 Single HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]

The Permittee shall determine the calendar month single HAP emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with one of the following methodologies using the input values determined in D.1.6 above:

- (a)

$$HAP(x) = \left[\sum_{i=1}^N HAP(x)_{RECEIVED(i)} + \sum_{i=1}^N HAP(x)_{ADDITIVES(i)} - \sum_{i=1}^N HAP(x)_{SHIPPED(i)} \right] / \left[2,000 \frac{\text{lb}}{\text{ton}} \right]$$

Where:

- | | | |
|--------|---|-----------------------------|
| HAP(x) | = | HAP(x) emitted (tons/month) |
|--------|---|-----------------------------|

HAP(x)_{RECEIVED} = HAP(x) content of each shipment of waste product received for each month (lbs HAP(x)/shipment)
HAP(x)_{ADDITIVES} = HAP(x) content of additive used for each month (lbs HAP(x)/lb additive)
HAP(x)_{SHIPPED} = HAP(x) content of each shipment of final product (lbs HAP(x)/shipment)
(x) = Single HAP

(1) In lieu of deducting the amount of HAP(x) contained in the final product (oil) (HAP(x)_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

(b) In lieu of calculating HAP(x) emissions, the Permittee may opt to count the calculated total HAPs or VHAPs emissions, as determined in accordance with Condition D.1.8, as HAP(x) emitted.

D.1.10 Continuous Emissions Monitoring [326 IAC 3-5][326 IAC 2-7-6(1),(6)]

- (a) Pursuant to 326 IAC 3-5 (Continuous Monitoring of Emissions) continuous emission monitoring systems for the scrubber system shall be calibrated, maintained, and operated for measuring the exhaust flow rate and the SO₂ ppmv and VOC ppmv of the scrubber outlet, which meet all applicable performance specifications of 326 IAC 3-5-2.
- (b) All continuous emissions monitoring systems are subject to monitor system certification requirements pursuant to 326 IAC 3-5-3.
- (c) Nothing in this permit shall excuse the Permittee from complying with the requirements to operate a continuous emission monitoring system pursuant to 326 IAC 3-5.

Compliance Monitoring Requirements [326 IAC 2-8-4][326 IAC 2-8-5(a)(1)]

D.1.11 Parametric Monitoring for Scrubber [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

The Permittee shall record the total static pressure drop across the scrubbers used in conjunction with the tanks, at least once per day when the tanks are in operation when venting to the atmosphere. When for any one reading, the pressure drop across the scrubber is outside the normal range of 1-4 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

The instrument used for determining the pressure shall comply with Section C - Instrument Specifications, of this permit, shall be subject to approval by IDEM, OAQ, and OES and shall be calibrated at least once every six (6) months.

D.1.12 Scrubber Failure Detection [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

In the event that scrubber failure has been observed:

The failed unit and associated tanks, P1, P2, P3, P4, P5, P6, P7, P8, P9, P10, P11, P12, P13, P14, P15, SHT2, W8, D1, D2, D3, D4, D5, K1, K2, or/and K3, will be shut down as soon as practicable until the failed units have been repaired or replaced. Operations may continue as soon as practicable if the event qualifies as an emergency and the Permittee satisfies the technology-based requirements of the emergency provisions of this permit (Section B -

Emergency Provisions). Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

D.1.13 Tank Temperature

- (a) A continuous monitoring system shall be calibrated, maintained, and operated on the heated tanks routed to the hypochlorite injection scrubber for measuring operating temperature. For the purpose of this condition, continuous means no less often than once per fifteen (15) minutes. The output of this system shall be recorded as 3-hour average. The Permittee shall operate the tanks below the range outlined in Condition D.1.1(b).
- (d) If the temperature exceeds the above mentioned temperature, the Permittee shall take a reasonable response. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

D.1.14 Parametric Monitoring - Hypochlorite Injection

The Permittee shall record the hypochlorite feed rate into the scrubber at least once per day when the tanks are in operation. When, for any one reading, the hypochlorite feed rate into the scrubber is outside the normal range, the Permittee shall take a reasonable response. The normal range for this unit is a feed rate between 0.053 and 0.28 ft³/hr unless a different upper-bound or lower-bound value for this range is determined during the latest stack test. Section C - Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. A reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

D.1.15 SO₂ and VOC Continuous Emissions Monitoring (CEMS) Equipment Downtime

- (a) In the event that a breakdown of a SO₂ and VOC continuous emissions monitoring system (CEMS) occurs, a record shall be made of the time and reason of the breakdown and efforts made to correct the problem.
- (b) Whenever a SO₂ continuous emissions monitoring system (CEMS) is malfunctioning or is down for maintenance or repairs for a period of twenty-four (24) hours or more, a backup SO₂ CEMS shall be brought online.
- (c) Whenever a VOC continuous emissions monitoring system (CEMS) is malfunctioning or is down for maintenance or repairs for a period of twenty-four (24) hours or more, a backup VOC CEMS shall be brought online.

Record Keeping and Reporting Requirement [326 IAC 2-8-4(3)][326 IAC 2-8-16]

D.1.16 Record Keeping Requirements [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]

- (a) To document the compliance status with Conditions D.1.1 and D.1.6, the Permittee shall maintain records in accordance with (1) and (5) below. Records maintained for (1) and (5) shall be taken monthly and shall be complete and sufficient to establish compliance with the VOC, total HAPs, single HAP, and SO₂ emission limits established in Condition D.1.1, the requirements of Condition D.1.6, and to document the quantity of any VOC, total HAPs, single HAP, and SO₂ contained in the final product (oil) produced and deducted from total reported VOC, total HAPs, single HAP, and SO₂ emissions and total sulfur, VOC and HAP in the incoming waster and additives. Records necessary to demonstrate compliance shall be available not later than 30 days of the end of each compliance period.

- (1) The VOC, total HAPs, single HAP, and Sulfur content of each waste stream received in accordance with the following:
 - (A) Vendor certification of VOC, total HAPs, single HAP, and Sulfur content of each shipment of waste product received in pounds per shipment; or,
 - (B) Results of the independent laboratory analysis of VOC, total HAPs, single HAP, and Sulfur content of each shipment of waste product received in pounds per shipment.

Records shall include purchase orders, invoices and verify the amount and date received.

- (2) The VOC, total HAPs, single HAP, and Sulfur content of each additive used in accordance with the following:
 - (A) Vendor certification of VOC, total HAPs, single HAP, and Sulfur content of additive; or,
 - (B) Results of the independent laboratory analysis of VOC, total HAPs, single HAP, and Sulfur content of each additive; or,
 - (C) Material safety data sheets (MSDS).

Records shall include purchase orders, invoices and verify the amount and date received.

- (3) The amount of each additive used on a monthly basis.
- (4) If the amount of VOC, total HAPs, single HAP, and Sulfur in the final product (oil) produced is being deducted from the VOC, total HAPs, single HAP, and SO₂ emissions, then the following records shall be maintained:
 - (A) The amount of final product (oil) produced each month. If multiple final product streams are collected and drummed separately, the amount produced out shall be recorded separately for each stream.
 - (B) The VOC, total HAPs, single HAP, and Sulfur content of each final product stream (oil) produced each month and all records necessary to verify the amount and VOC, HAPs and Sulfur content of the VOC, HAPs and Sulfur in the final products (oil) produced.
 - (C) The weight of VOC, total HAPs, single HAP, and Sulfur in the final product (oil), for each compliance period.
- (5) The calculated weight of VOC, total HAPs, single HAP, and SO₂ emitted, for each compliance period. Records maintained shall be complete and sufficient verify the calculated results.

- (b) To document the compliance status with Condition D.1.1, the Permittee shall maintain records of calculations required by Conditions D.1.7, D.1.8, and D.1.9.
- (c) To document the compliance status with Condition D.1.11, the Permittee shall maintain daily records of the Pressure Drop for the scrubber. The Permittee shall include in its daily record when they are not taken and the reason for the lack of the readings (e.g., the process did not operate that day).

- (d) To document the compliance status with Condition D.1.12, the Permittee shall maintain continuous temperature records for the heated tanks and the 3-hour average temperature.
- (e) To document the compliance status with Condition D.1.14, the Permittee shall maintain daily records of the hypochlorite feed rate into the scrubber. The Permittee shall include in its daily record when the hypochlorite feed rate is not taken and the reason for the lack of hypochlorite feed rate data (e.g. the process did not operate that day).
- (f) The Permittee shall record the output of the continuous monitoring system in pounds per hour and shall perform the required record keeping pursuant to 326 IAC 3-5-6 and 326 IAC 3-5-7.
- (g) In the event that a breakdown of the SO₂ or VOC continuous emission monitoring systems (CEMS) occurs, the Permittee shall maintain records of all CEMS malfunctions, out of control periods, calibration and adjustment activities, and repair or maintenance activities.
- (h) Section C - General Record Keeping Requirements contains the Permittee's obligation with regard to the records required by this condition.

D.1.17 Reporting Requirements for CEMS [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]

- (a) The Permittee shall prepare and submit to IDEM, OAQ a written report of the results of the calibration gas audits and relative accuracy test audits for each calendar quarter within thirty (30) calendar days after the end of each quarter. The report must contain the information required by 326 IAC 3-5-5(e)(2).

The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (b) Pursuant to 326 IAC 3-5-7(5), reporting of continuous monitoring system instrument downtime, except for zero (0) and span checks, which shall be reported separately, shall include the following:
 - (1) date of downtime;
 - (2) time of commencement;
 - (3) duration of each downtime;
 - (4) reasons for each downtime; and
 - (5) nature of system repairs and adjustments.

The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (c) A quarterly report of VOC, SO₂, single HAPs and Total HAPs emissions shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, within thirty (30) days after the end of the quarter being reported. The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

- (a) 350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas fired, identified as Emission Unit ID #1.
- (b) 600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas fired, identified as Emission Unit ID #2.

Specifically Regulated Insignificant Activities:

- (a) Natural gas-fired combustion sources with heat input equal to or less than ten (10) million Btu per hour:
 - (1) Unit Heater - Maintenance, 0.130 MMBtu/hr.
 - (2) Storage Heater - Maintenance, 0.175 MMBtu/hr.
 - (3) Unit Heater 1 - Blending, 0.175 MMBtu/hr.
 - (4) Unit Heater 2 - Blending, 0.175 MMBtu/hr.;
 - (5) Unit Heater 3 - Blending, 0.175 MMBtu/hr.
 - (6) Make-up Unit - Blending, 0.175 MMBtu/hr.
 - (7) Unit Heater 1 - Water Treatment, 0.400 MMBtu/hr.
 - (8) Unit Heater 2 - Water Treatment, 0.130 MMBtu/hr.
 - (9) Unit Heater 3 - Water Treatment, 0.130 MMBtu/hr.;
 - (10) Make-up Unit - Water Treatment, 0.985 MMcf/hr.
 - (11) Individual Water Heater (temp.), 0.150 MMBtu/hr.
 - (12) Space Heater 1 - Office, 0.115 MMBtu/hr.
 - (13) Space Heater 2 - Office, 0.115 MMBtu/hr.;
 - (14) Space Heater 3 - Office, 0.130 MMBtu/hr..
- (b) One (1) portable air compressor with a maximum capacity of 5.5 HP, constructed in 2011.
- (c) One (1) diesel fired salamander, with a maximum capacity of 0.4 MMBtu/hr, constructed in 2005.
- (d) One (1) portable power washer with a diesel water heater, identified as Power Washer #1, with a maximum capacity of 0.4 MMBtu/hr, constructed in 1997.
- (e) One (1) portable power washer with a diesel water heater, identified as Power Washer #2, with a maximum capacity of 0.4 MMBtu/hr constructed in 2012.

(The information describing the process contained in this emissions unit description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards [326 IAC 2-8-4(1)]

D.2.1 Particulate Emissions Limitation [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating), the PM emissions from the following units shall be limited to Pt pounds per MMBtu heat input, as follows:

Emission Unit	Pt (lb/MMBtu)
350 HP Leffel boiler (Unit ID: #1)	0.57
600 HP Kewanee boiler (Unit ID: #2)	0.44
Unit Heater - Maintenance	0.44
Storage Heater - Maintenance	0.44
Unit Heater 3 - Blending	0.44
Unit Heater 4 - Blending	0.44
Unit Heater 5 - Blending	0.44
Make-up Unit 1 - Blending	0.44
Unit Heater 1 - Water Treatment	0.44
Unit Heater 2 - Water Treatment	0.44
Unit Heater 3 - Water Treatment	0.44
Individual Water Heater (temp.)	0.44
Unit Heater 1 - Maintenance	0.44
Unit Heater 2 - Maintenance	0.44
Unit Heater 3 - Storage/Meeting area	0.44
Make-up Unit 3 - Maintenance	0.44
Make-up Unit 2 - Water Treatment	0.44
Heated Power Washer #1	0.43
diesel fired salamander	0.43
Heated Power Washer #2	0.43

D.2.2 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan is required for these facilities and any control devices. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

SECTION E.1

NSPS

Emissions Unit Description:

- (a) 350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas fired, identified as Emission Unit ID #1.
- (b) 600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas fired, identified as Emission Unit ID #2.

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

New Source Performance Standards (NSPS) Requirements [326 IAC 2-8-4(1)]

E.1.1 General Provisions Relating to New Source Performance Standards [326 IAC 12-1][40 CFR Part 60, Subpart A]

- (a) Pursuant to 40 CFR 60.1, the Permittee shall comply with the provisions of 40 CFR Part 60, Subpart A – General Provisions, which are incorporated by reference as 326 IAC 12-1, for the above listed emissions units, except as otherwise specified in 40 CFR Part 60, Subpart Dc.

- (b) Pursuant to 40 CFR 60.4, the Permittee shall submit all required notifications and reports to:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

United States Environmental Protection Agency, Region V
Air and Radiation Division, Air Enforcement Branch - Indiana (AE-17J)
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

E.1.2 Small Industrial-Commercial-Institutional Steam Generating Units NSPS [326 IAC 12][40 CFR Part 60, Subpart Dc]

Pursuant to 40 CFR Part 60, Subpart Dc, the Permittee shall comply with the provisions of 40 CFR Part 60, Subpart Dc, which are incorporated by reference as 326 IAC 12 (included as Attachment A to this permit), for the above listed emissions units as specified as follows.

- (1) 40 CFR 60.40c(a),(b),(c)
- (2) 40 CFR 60.41c
- (3) 40 CFR 60.42c(h)(4), (i)
- (4) 40 CFR 60.44c(a), (b), (c)
- (5) 40 CFR 60.46c(e)
- (6) 40 CFR 60.48c(a), (g)(2), (h), (i), (j)

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

**FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
CERTIFICATION**

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
FESOP Permit No.: F097-32513-00139

This certification shall be included when submitting monitoring, testing reports/results or other documents as required by this permit.

Please check what document is being certified:

- ☐ Annual Compliance Certification Letter
- ☐ Test Result (specify) _____
- ☐ Report (specify) _____
- ☐ Notification (specify) _____
- ☐ Affidavit (specify) _____
- ☐ Other (specify) _____

I certify that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.

Signature: _____

Printed Name: _____

Title/Position: _____

Date: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE BRANCH
P.O. Box 6015
100 North Senate Avenue
Indianapolis, Indiana 46204-2251
Phone: 317-233-5674
Fax: 317-233-5967**

**FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
EMERGENCY OCCURRENCE REPORT**

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
FESOP Permit No.: F097-32513-00139

This form consists of 2 pages

Page 1 of 2

<input type="checkbox"/> This is an emergency as defined in 326 IAC 2-7-1(12) <ul style="list-style-type: none">• The Permittee must notify the Office of Air Quality (OAQ), within four (4) business hours (1-800-451-6027 or 317-233-0178, ask for Compliance Section); and• The Permittee must submit notice in writing or by facsimile within two (2) working days (Facsimile Number: 317-233-6865), and follow the other requirements of 326 IAC 2-7-16

If any of the following are not applicable, mark N/A

Facility/Equipment/Operation:
Control Equipment:
Permit Condition or Operation Limitation in Permit:
Description of the Emergency:
Describe the cause of the Emergency:

If any of the following are not applicable, mark N/A

Page 2 of 2

Date/Time Emergency started:
Date/Time Emergency was corrected:
Was the facility being properly operated at the time of the emergency? Y N Describe:
Type of Pollutants Emitted: TSP, PM-10, SO ₂ , VOC, NO _x , CO, Pb, other:
Estimated amount of pollutant(s) emitted during emergency:
Describe the steps taken to mitigate the problem:
Describe the corrective actions/response steps taken:
Describe the measures taken to minimize emissions:
If applicable, describe the reasons why continued operation of the facilities are necessary to prevent imminent injury to persons, severe damage to equipment, substantial loss of capital investment, or loss of product or raw materials of substantial economic value:

Form Completed by: _____
Title / Position: _____
Date: _____
Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

**FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
SEMI-ANNUAL NATURAL GAS FIRED BOILER CERTIFICATION**

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
FESOP Permit No.: F097-32513-00139

<input type="checkbox"/> Natural Gas Only
<input type="checkbox"/> Alternate Fuel burned
From: _____ To: _____

I certify that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. Signature:
Printed Name:
Title/Position:
Date:

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

FESOP VOC Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-32513-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: VOC emissions
Limit: Ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

YEAR:

Month	VOC emissions (tons)	VOC emissions (tons)	VOC emissions (tons)
	This Month	Previous 11 Months	12 Month Total

- ☐ No deviation occurred in this quarter.
- ☐ Deviation/s occurred in this quarter.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

FESOP SO2 Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-32513-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: SO2 emissions
Limit: Ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

YEAR:

Month	SO2 emissions (tons)	SO2 emissions (tons)	SO2 emissions (tons)
	This Month	Previous 11 Months	12 Month Total

- ☐ No deviation occurred in this quarter.
- ☐ Deviation/s occurred in this quarter.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

FESOP SINGLE HAP Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-32513-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: Single HAP emissions
Limit: Nine (9) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

YEAR:

Month	HAP emissions (tons)	HAP emissions (tons)	HAP emissions (tons)
	This Month	Previous 11 Months	12 Month Total

- ☐ No deviation occurred in this quarter.
- ☐ Deviation/s occurred in this quarter.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

FESOP TOTAL HAPs Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-32513-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: Total HAPs emissions
Limit: Twenty-four (24) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

YEAR:

Month	Total HAPs emissions (tons)	Total HAPs emissions (tons)	Total HAPs emissions (tons)
	This Month	Previous 11 Months	12 Month Total

- ☐ No deviation occurred in this quarter.
- ☐ Deviation/s occurred in this quarter.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

**FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT**

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
FESOP Permit No.: F097-32513-00139

Months: _____ to _____ Year: _____

Page 1 of 2

This report shall be submitted quarterly based on a calendar year. Proper notice submittal under Section B - Emergency Provisions satisfies the reporting requirements of paragraph (a) of Section C - General Reporting. Any deviation from the requirements of this permit, the date(s) of each deviation, the probable cause of the deviation, and the response steps taken must be reported. A deviation required to be reported pursuant to an applicable requirement that exists independent of the permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report. Additional pages may be attached if necessary. If no deviations occurred, please specify in the box marked "No deviations occurred this reporting period".

☐ NO DEVIATIONS OCCURRED THIS REPORTING PERIOD.

☐ THE FOLLOWING DEVIATIONS OCCURRED THIS REPORTING PERIOD

Permit Requirement (specify permit condition #)

Date of Deviation:

Duration of Deviation:

Number of Deviations:

Probable Cause of Deviation:

Response Steps Taken:

Permit Requirement (specify permit condition #)

Date of Deviation:

Duration of Deviation:

Number of Deviations:

Probable Cause of Deviation:

Response Steps Taken:

Permit Requirement (specify permit condition #)	
Date of Deviation:	Duration of Deviation:
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	
Permit Requirement (specify permit condition #)	
Date of Deviation:	Duration of Deviation:
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	
Permit Requirement (specify permit condition #)	
Date of Deviation:	Duration of Deviation:
Number of Deviations:	
Probable Cause of Deviation:	
Response Steps Taken:	

Form Completed By: _____

Title/Position: _____

Date: _____

Phone: _____

Attachment A

Federally Enforceable State Operating Permit (FESOP) No: F097-32513-00139

[Downloaded from the eCFR on May 13, 2013]

Electronic Code of Federal Regulations

Title 40: Protection of Environment

PART 60—STANDARDS OF PERFORMANCE FOR NEW STATIONARY SOURCES

Subpart Dc—Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units

Source: 72 FR 32759, June 13, 2007, unless otherwise noted.

§ 60.40c Applicability and delegation of authority.

(a) Except as provided in paragraphs (d), (e), (f), and (g) of this section, the affected facility to which this subpart applies is each steam generating unit for which construction, modification, or reconstruction is commenced after June 9, 1989 and that has a maximum design heat input capacity of 29 megawatts (MW) (100 million British thermal units per hour (MMBtu/h)) or less, but greater than or equal to 2.9 MW (10 MMBtu/h).

(b) In delegating implementation and enforcement authority to a State under section 111(c) of the Clean Air Act, § 60.48c(a)(4) shall be retained by the Administrator and not transferred to a State.

(c) Steam generating units that meet the applicability requirements in paragraph (a) of this section are not subject to the sulfur dioxide (SO₂) or particulate matter (PM) emission limits, performance testing requirements, or monitoring requirements under this subpart (§§ 60.42c, 60.43c, 60.44c, 60.45c, 60.46c, or 60.47c) during periods of combustion research, as defined in § 60.41c.

(d) Any temporary change to an existing steam generating unit for the purpose of conducting combustion research is not considered a modification under § 60.14.

(e) Affected facilities (*i.e.* heat recovery steam generators and fuel heaters) that are associated with stationary combustion turbines and meet the applicability requirements of subpart KKKK of this part are not subject to this subpart. This subpart will continue to apply to all other heat recovery steam generators, fuel heaters, and other affected facilities that are capable of combusting more than or equal to 2.9 MW (10 MMBtu/h) heat input of fossil fuel but less than or equal to 29 MW (100 MMBtu/h) heat input of fossil fuel. If the heat recovery steam generator, fuel heater, or other affected facility is subject to this subpart, only emissions resulting from combustion of fuels in the steam generating unit are subject to this subpart. (The stationary combustion turbine emissions are subject to subpart GG or KKKK, as applicable, of this part.)

(f) Any affected facility that meets the applicability requirements of and is subject to subpart AAAA or subpart CCCC of this part is not subject to this subpart.

(g) Any facility that meets the applicability requirements and is subject to an EPA approved State or Federal section 111(d)/129 plan implementing subpart BBBB of this part is not subject to this subpart.

(h) Affected facilities that also meet the applicability requirements under subpart J or subpart Ja of this part are subject to the PM and NO_x standards under this subpart and the SO₂ standards under subpart J or subpart Ja of this part, as applicable.

(i) Temporary boilers are not subject to this subpart.

[72 FR 32759, June 13, 2007, as amended at 74 FR 5090, Jan. 28, 2009; 77 FR 9461, Feb. 16, 2012]

§ 60.41c Definitions.

As used in this subpart, all terms not defined herein shall have the meaning given them in the Clean Air Act and in subpart A of this part.

Annual capacity factor means the ratio between the actual heat input to a steam generating unit from an individual fuel or combination of fuels during a period of 12 consecutive calendar months and the potential heat input to the steam generating unit from all fuels had the steam generating unit been operated for 8,760 hours during that 12-month period at the maximum design heat input capacity. In the case of steam generating units that are rented or leased, the actual heat input shall be determined based on the combined heat input from all operations of the affected facility during a period of 12 consecutive calendar months.

Coal means all solid fuels classified as anthracite, bituminous, subbituminous, or lignite by the American Society of Testing and Materials in ASTM D388 (incorporated by reference, see § 60.17), coal refuse, and petroleum coke. Coal-derived synthetic fuels derived from coal for the purposes of creating useful heat, including but not limited to solvent refined coal, gasified coal not meeting the definition of natural gas, coal-oil mixtures, and coal-water mixtures, are also included in this definition for the purposes of this subpart.

Coal refuse means any by-product of coal mining or coal cleaning operations with an ash content greater than 50 percent (by weight) and a heating value less than 13,900 kilojoules per kilogram (kJ/kg) (6,000 Btu per pound (Btu/lb) on a dry basis.

Combined cycle system means a system in which a separate source (such as a stationary gas turbine, internal combustion engine, or kiln) provides exhaust gas to a steam generating unit.

Combustion research means the experimental firing of any fuel or combination of fuels in a steam generating unit for the purpose of conducting research and development of more efficient combustion or more effective prevention or control of air pollutant emissions from combustion, provided that, during these periods of research and development, the heat generated is not used for any purpose other than preheating combustion air for use by that steam generating unit (i.e., the heat generated is released to the atmosphere without being used for space heating, process heating, driving pumps, preheating combustion air for other units, generating electricity, or any other purpose).

Conventional technology means wet flue gas desulfurization technology, dry flue gas desulfurization technology, atmospheric fluidized bed combustion technology, and oil hydrodesulfurization technology.

Distillate oil means fuel oil that complies with the specifications for fuel oil numbers 1 or 2, as defined by the American Society for Testing and Materials in ASTM D396 (incorporated by reference, see § 60.17), diesel fuel oil numbers 1 or 2, as defined by the American Society for Testing and Materials in ASTM D975 (incorporated by reference, see § 60.17), kerosine, as defined by the American Society of Testing and Materials in ASTM D3699 (incorporated by reference, see § 60.17), biodiesel as defined by the American Society of Testing and Materials in ASTM D6751 (incorporated by reference, see § 60.17), or biodiesel blends as defined by the American Society of Testing and Materials in ASTM D7467 (incorporated by reference, see § 60.17).

Dry flue gas desulfurization technology means a SO₂ control system that is located between the steam generating unit and the exhaust vent or stack, and that removes sulfur oxides from the combustion gases of the steam generating unit by contacting the combustion gases with an alkaline reagent and water, whether introduced separately or as a premixed slurry or solution and forming a dry powder material. This definition includes devices where the dry powder material is subsequently converted to another form. Alkaline reagents used in dry flue gas desulfurization systems include, but are not limited to, lime and sodium compounds.

Duct burner means a device that combusts fuel and that is placed in the exhaust duct from another source (such as a stationary gas turbine, internal combustion engine, kiln, etc.) to allow the firing of additional fuel to heat the exhaust gases before the exhaust gases enter a steam generating unit.

Emerging technology means any SO₂ control system that is not defined as a conventional technology under this section, and for which the owner or operator of the affected facility has received approval from the Administrator to operate as an emerging technology under § 60.48c(a)(4).

Federally enforceable means all limitations and conditions that are enforceable by the Administrator, including the requirements of 40 CFR parts 60 and 61, requirements within any applicable State implementation plan, and any permit requirements established under 40 CFR 52.21 or under 40 CFR 51.18 and 51.24.

Fluidized bed combustion technology means a device wherein fuel is distributed onto a bed (or series of beds) of limestone aggregate (or other sorbent materials) for combustion; and these materials are forced upward in the device by the flow of combustion air and the gaseous products of combustion. Fluidized bed combustion technology includes, but is not limited to, bubbling bed units and circulating bed units.

Fuel pretreatment means a process that removes a portion of the sulfur in a fuel before combustion of the fuel in a steam generating unit.

Heat input means heat derived from combustion of fuel in a steam generating unit and does not include the heat derived from preheated combustion air, recirculated flue gases, or exhaust gases from other sources (such as stationary gas turbines, internal combustion engines, and kilns).

Heat transfer medium means any material that is used to transfer heat from one point to another point.

Maximum design heat input capacity means the ability of a steam generating unit to combust a stated maximum amount of fuel (or combination of fuels) on a steady state basis as determined by the physical design and characteristics of the steam generating unit.

Natural gas means:

- (1) A naturally occurring mixture of hydrocarbon and nonhydrocarbon gases found in geologic formations beneath the earth's surface, of which the principal constituent is methane; or
- (2) Liquefied petroleum (LP) gas, as defined by the American Society for Testing and Materials in ASTM D1835 (incorporated by reference, see § 60.17); or
- (3) A mixture of hydrocarbons that maintains a gaseous state at ISO conditions. Additionally, natural gas must either be composed of at least 70 percent methane by volume or have a gross calorific value between 34 and 43 megajoules (MJ) per dry standard cubic meter (910 and 1,150 Btu per dry standard cubic foot).

Noncontinental area means the State of Hawaii, the Virgin Islands, Guam, American Samoa, the Commonwealth of Puerto Rico, or the Northern Mariana Islands.

Oil means crude oil or petroleum, or a liquid fuel derived from crude oil or petroleum, including distillate oil and residual oil.

Potential sulfur dioxide emission rate means the theoretical SO₂ emissions (nanograms per joule (ng/J) or lb/MMBtu heat input) that would result from combusting fuel in an uncleaned state and without using emission control systems.

Process heater means a device that is primarily used to heat a material to initiate or promote a chemical reaction in which the material participates as a reactant or catalyst.

Residual oil means crude oil, fuel oil that does not comply with the specifications under the definition of distillate oil, and all fuel oil numbers 4, 5, and 6, as defined by the American Society for Testing and Materials in ASTM D396 (incorporated by reference, see § 60.17).

Steam generating unit means a device that combusts any fuel and produces steam or heats water or heats any heat transfer medium. This term includes any duct burner that combusts fuel and is part of a combined cycle system. This term does not include process heaters as defined in this subpart.

Steam generating unit operating day means a 24-hour period between 12:00 midnight and the following midnight during which any fuel is combusted at any time in the steam generating unit. It is not necessary for fuel to be combusted continuously for the entire 24-hour period.

Temporary boiler means a steam generating unit that combusts natural gas or distillate oil with a potential SO₂ emissions rate no greater than 26 ng/J (0.060 lb/MMBtu), and the unit is designed to, and is capable of, being carried or moved from one location to another by means of, for example, wheels, skids, carrying handles, dollies, trailers, or platforms. A steam generating unit is not a temporary boiler if any one of the following conditions exists:

- (1) The equipment is attached to a foundation.
- (2) The steam generating unit or a replacement remains at a location for more than 180 consecutive days. Any temporary boiler that replaces a temporary boiler at a location and performs the same or similar function will be included in calculating the consecutive time period.
- (3) The equipment is located at a seasonal facility and operates during the full annual operating period of the seasonal facility, remains at the facility for at least 2 years, and operates at that facility for at least 3 months each year.
- (4) The equipment is moved from one location to another in an attempt to circumvent the residence time requirements of this definition.

Wet flue gas desulfurization technology means an SO₂ control system that is located between the steam generating unit and the exhaust vent or stack, and that removes sulfur oxides from the combustion gases of the steam generating unit by contacting the combustion gases with an alkaline slurry or solution and forming a liquid material. This definition includes devices where the liquid material is subsequently converted to another form. Alkaline reagents used in wet flue gas desulfurization systems include, but are not limited to, lime, limestone, and sodium compounds.

Wet scrubber system means any emission control device that mixes an aqueous stream or slurry with the exhaust gases from a steam generating unit to control emissions of PM or SO₂.

Wood means wood, wood residue, bark, or any derivative fuel or residue thereof, in any form, including but not limited to sawdust, sanderdust, wood chips, scraps, slabs, millings, shavings, and processed pellets made from wood or other forest residues.

[72 FR 32759, June 13, 2007, as amended at 74 FR 5090, Jan. 28, 2009; 77 FR 9461, Feb. 16, 2012]

§ 60.42c Standard for sulfur dioxide (SO₂).

(a) Except as provided in paragraphs (b), (c), and (e) of this section, on and after the date on which the performance test is completed or required to be completed under § 60.8, whichever date comes first, the owner or operator of an affected facility that combusts only coal shall neither: cause to be discharged into the atmosphere from the affected facility any gases that contain SO₂ in excess of 87 ng/J (0.20 lb/MMBtu) heat input or 10 percent (0.10) of the potential SO₂ emission rate (90 percent reduction), nor cause to be discharged into the atmosphere from the affected facility any gases that contain SO₂ in excess of 520 ng/J (1.2 lb/MMBtu) heat input. If coal is combusted with other fuels, the affected facility shall neither: cause to be discharged into the atmosphere from the affected facility any gases that contain SO₂ in excess of 87 ng/J (0.20 lb/MMBtu) heat input or 10 percent (0.10) of the potential SO₂ emission rate (90 percent reduction), nor cause to be discharged into the atmosphere from the affected facility any gases that contain SO₂ in excess of the emission limit is determined pursuant to paragraph (e)(2) of this section.

(b) Except as provided in paragraphs (c) and (e) of this section, on and after the date on which the performance test is completed or required to be completed under § 60.8, whichever date comes first, the owner or operator of an affected facility that:

(1) Combusts only coal refuse alone in a fluidized bed combustion steam generating unit shall neither:

(i) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of 87 ng/J (0.20 lb/MMBtu) heat input or 20 percent (0.20) of the potential SO₂ emission rate (80 percent reduction); nor

(ii) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of SO₂ in excess of 520 ng/J (1.2 lb/MMBtu) heat input. If coal is fired with coal refuse, the affected facility subject to paragraph (a) of this section. If oil or any other fuel (except coal) is fired with coal refuse, the affected facility is subject to the 87 ng/J (0.20 lb/MMBtu) heat input SO₂ emissions limit or the 90 percent SO₂ reduction requirement specified in paragraph (a) of this section and the emission limit is determined pursuant to paragraph (e)(2) of this section.

(2) Combusts only coal and that uses an emerging technology for the control of SO₂ emissions shall neither:

(i) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of 50 percent (0.50) of the potential SO₂ emission rate (50 percent reduction); nor

(ii) Cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of 260 ng/J (0.60 lb/MMBtu) heat input. If coal is combusted with other fuels, the affected facility is subject to the 50 percent SO₂ reduction requirement specified in this paragraph and the emission limit determined pursuant to paragraph (e)(2) of this section.

(c) On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that combusts coal, alone or in combination with any other fuel, and is listed in paragraphs (c)(1), (2), (3), or (4) of this section shall cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of the emission limit determined pursuant to paragraph (e)(2) of this section. Percent reduction requirements are not applicable to affected facilities under paragraphs (c)(1), (2), (3), or (4).

(1) Affected facilities that have a heat input capacity of 22 MW (75 MMBtu/h) or less;

(2) Affected facilities that have an annual capacity for coal of 55 percent (0.55) or less and are subject to a federally enforceable requirement limiting operation of the affected facility to an annual capacity factor for coal of 55 percent (0.55) or less.

(3) Affected facilities located in a noncontinental area; or

(4) Affected facilities that combust coal in a duct burner as part of a combined cycle system where 30 percent (0.30) or less of the heat entering the steam generating unit is from combustion of coal in the duct burner and 70 percent (0.70) or more of the heat entering the steam generating unit is from exhaust gases entering the duct burner.

(d) On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that combusts oil shall cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of 215 ng/J (0.50 lb/MMBtu) heat input from oil; or, as an alternative, no owner or operator of an affected facility that combusts oil shall combust oil in the affected facility that contains greater than 0.5 weight percent sulfur. The percent reduction requirements are not applicable to affected facilities under this paragraph.

(e) On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that combusts coal, oil, or coal and oil with any other fuel shall cause to be discharged into the atmosphere from that affected facility any gases that contain SO₂ in excess of the following:

(1) The percent of potential SO₂ emission rate or numerical SO₂ emission rate required under paragraph (a) or (b)(2) of this section, as applicable, for any affected facility that

(i) Combusts coal in combination with any other fuel;

(ii) Has a heat input capacity greater than 22 MW (75 MMBtu/h); and

(iii) Has an annual capacity factor for coal greater than 55 percent (0.55); and

(2) The emission limit determined according to the following formula for any affected facility that combusts coal, oil, or coal and oil with any other fuel:

$$E_s = \frac{(K_a H_a + K_b H_b + K_c H_c)}{(H_a + H_b + H_c)}$$

Where:

E_s = SO₂ emission limit, expressed in ng/J or lb/MMBtu heat input;

K_a = 520 ng/J (1.2 lb/MMBtu);

K_b = 260 ng/J (0.60 lb/MMBtu);

K_c = 215 ng/J (0.50 lb/MMBtu);

H_a = Heat input from the combustion of coal, except coal combusted in an affected facility subject to paragraph (b)(2) of this section, in Joules (J) [MMBtu];

H_b = Heat input from the combustion of coal in an affected facility subject to paragraph (b)(2) of this section, in J (MMBtu); and

H_c = Heat input from the combustion of oil, in J (MMBtu).

(f) Reduction in the potential SO₂ emission rate through fuel pretreatment is not credited toward the percent reduction requirement under paragraph (b)(2) of this section unless:

(1) Fuel pretreatment results in a 50 percent (0.50) or greater reduction in the potential SO₂ emission rate; and

(2) Emissions from the pretreated fuel (without either combustion or post-combustion SO₂ control) are equal to or less than the emission limits specified under paragraph (b)(2) of this section.

(g) Except as provided in paragraph (h) of this section, compliance with the percent reduction requirements, fuel oil sulfur limits, and emission limits of this section shall be determined on a 30-day rolling average basis.

(h) For affected facilities listed under paragraphs (h)(1), (2), (3), or (4) of this section, compliance with the emission limits or fuel oil sulfur limits under this section may be determined based on a certification from the fuel supplier, as described under § 60.48c(f), as applicable.

(1) Distillate oil-fired affected facilities with heat input capacities between 2.9 and 29 MW (10 and 100 MMBtu/hr).

(2) Residual oil-fired affected facilities with heat input capacities between 2.9 and 8.7 MW (10 and 30 MMBtu/hr).

(3) Coal-fired affected facilities with heat input capacities between 2.9 and 8.7 MW (10 and 30 MMBtu/h).

(4) Other fuels-fired affected facilities with heat input capacities between 2.9 and 8.7 MW (10 and 30 MMBtu/h).

(i) The SO₂ emission limits, fuel oil sulfur limits, and percent reduction requirements under this section apply at all times, including periods of startup, shutdown, and malfunction.

(j) For affected facilities located in noncontinental areas and affected facilities complying with the percent reduction standard, only the heat input supplied to the affected facility from the combustion of coal and oil is counted under this section. No credit is provided for the heat input to the affected facility from wood or other fuels or for heat derived from exhaust gases from other sources, such as stationary gas turbines, internal combustion engines, and kilns.

[72 FR 32759, June 13, 2007, as amended at 74 FR 5090, Jan. 28, 2009; 77 FR 9462, Feb. 16, 2012]

§ 60.43c Standard for particulate matter (PM).

(a) On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that commenced construction, reconstruction, or modification on or before February 28, 2005, that combusts coal or combusts mixtures of coal with other fuels and has a heat input capacity of 8.7 MW (30 MMBtu/h) or greater, shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of the following emission limits:

(1) 22 ng/J (0.051 lb/MMBtu) heat input if the affected facility combusts only coal, or combusts coal with other fuels and has an annual capacity factor for the other fuels of 10 percent (0.10) or less.

(2) 43 ng/J (0.10 lb/MMBtu) heat input if the affected facility combusts coal with other fuels, has an annual capacity factor for the other fuels greater than 10 percent (0.10), and is subject to a federally enforceable requirement limiting operation of the affected facility to an annual capacity factor greater than 10 percent (0.10) for fuels other than coal.

(b) On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that commenced construction, reconstruction, or modification on or before February 28, 2005, that combusts wood or combusts mixtures of wood with other fuels (except coal) and has a heat input capacity of 8.7 MW (30 MMBtu/h) or greater, shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of the following emissions limits:

(1) 43 ng/J (0.10 lb/MMBtu) heat input if the affected facility has an annual capacity factor for wood greater than 30 percent (0.30); or

(2) 130 ng/J (0.30 lb/MMBtu) heat input if the affected facility has an annual capacity factor for wood of 30 percent (0.30) or less and is subject to a federally enforceable requirement limiting operation of the affected facility to an annual capacity factor for wood of 30 percent (0.30) or less.

(c) On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that combusts coal, wood, or oil and has a heat input capacity of 8.7 MW (30 MMBtu/h) or greater shall cause to be discharged into the atmosphere from that affected facility any gases that exhibit greater than 20 percent opacity (6-minute average), except for one 6-minute period per hour of not more than 27 percent opacity. Owners and operators of an affected facility that elect to install, calibrate, maintain, and operate a continuous emissions monitoring system (CEMS) for measuring PM emissions according to the requirements of this subpart and are subject to a federally enforceable PM limit of 0.030 lb/MMBtu or less are exempt from the opacity standard specified in this paragraph (c).

(d) The PM and opacity standards under this section apply at all times, except during periods of startup, shutdown, or malfunction.

(e)(1) On and after the date on which the initial performance test is completed or is required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that commences construction, reconstruction, or modification after February 28, 2005, and that combusts coal, oil, wood, a mixture of these fuels, or a mixture of these fuels with any other fuels and has a heat input capacity of 8.7 MW (30 MMBtu/h) or greater shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of 13 ng/J (0.030 lb/MMBtu) heat input, except as provided in paragraphs (e)(2), (e)(3), and (e)(4) of this section.

(2) As an alternative to meeting the requirements of paragraph (e)(1) of this section, the owner or operator of an affected facility for which modification commenced after February 28, 2005, may elect to meet the requirements of this paragraph. On and after the date on which the initial performance test is completed or required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that commences modification

after February 28, 2005 shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of both:

(i) 22 ng/J (0.051 lb/MMBtu) heat input derived from the combustion of coal, oil, wood, a mixture of these fuels, or a mixture of these fuels with any other fuels; and

(ii) 0.2 percent of the combustion concentration (99.8 percent reduction) when combusting coal, oil, wood, a mixture of these fuels, or a mixture of these fuels with any other fuels.

(3) On and after the date on which the initial performance test is completed or is required to be completed under § 60.8, whichever date comes first, no owner or operator of an affected facility that commences modification after February 28, 2005, and that combusts over 30 percent wood (by heat input) on an annual basis and has a heat input capacity of 8.7 MW (30 MMBtu/h) or greater shall cause to be discharged into the atmosphere from that affected facility any gases that contain PM in excess of 43 ng/J (0.10 lb/MMBtu) heat input.

(4) An owner or operator of an affected facility that commences construction, reconstruction, or modification after February 28, 2005, and that combusts only oil that contains no more than 0.50 weight percent sulfur or a mixture of 0.50 weight percent sulfur oil with other fuels not subject to a PM standard under § 60.43c and not using a post-combustion technology (except a wet scrubber) to reduce PM or SO₂ emissions is not subject to the PM limit in this section.

[72 FR 32759, June 13, 2007, as amended at 74 FR 5091, Jan. 28, 2009; 77 FR 9462, Feb. 16, 2012]

§ 60.44c Compliance and performance test methods and procedures for sulfur dioxide.

(a) Except as provided in paragraphs (g) and (h) of this section and § 60.8(b), performance tests required under § 60.8 shall be conducted following the procedures specified in paragraphs (b), (c), (d), (e), and (f) of this section, as applicable. Section 60.8(f) does not apply to this section. The 30-day notice required in § 60.8(d) applies only to the initial performance test unless otherwise specified by the Administrator.

(b) The initial performance test required under § 60.8 shall be conducted over 30 consecutive operating days of the steam generating unit. Compliance with the percent reduction requirements and SO₂ emission limits under § 60.42c shall be determined using a 30-day average. The first operating day included in the initial performance test shall be scheduled within 30 days after achieving the maximum production rate at which the affected facility will be operated, but not later than 180 days after the initial startup of the facility. The steam generating unit load during the 30-day period does not have to be the maximum design heat input capacity, but must be representative of future operating conditions.

(c) After the initial performance test required under paragraph (b) of this section and § 60.8, compliance with the percent reduction requirements and SO₂ emission limits under § 60.42c is based on the average percent reduction and the average SO₂ emission rates for 30 consecutive steam generating unit operating days. A separate performance test is completed at the end of each steam generating unit operating day, and a new 30-day average percent reduction and SO₂ emission rate are calculated to show compliance with the standard.

(d) If only coal, only oil, or a mixture of coal and oil is combusted in an affected facility, the procedures in Method 19 of appendix A of this part are used to determine the hourly SO₂ emission rate (E_{ho}) and the 30-day average SO₂ emission rate (E_{ao}). The hourly averages used to compute the 30-day averages are obtained from the CEMS. Method 19 of appendix A of this part shall be used to calculate E_{ao} when using daily fuel sampling or Method 6B of appendix A of this part.

(e) If coal, oil, or coal and oil are combusted with other fuels:

(1) An adjusted E_{ho} ($E_{ho\ o}$) is used in Equation 19-19 of Method 19 of appendix A of this part to compute the adjusted E_{ao} ($E_{ao\ o}$). The $E_{ho\ o}$ is computed using the following formula:

$$E_{ho\ o} = \frac{E_{ho} - E_w(1 - X_1)}{X_1}$$

Where:

$E_{ho} = \text{Adjusted } E_{ho}, \text{ ng/J (lb/MMBtu);}$

$E_{ho} = \text{Hourly SO}_2 \text{ emission rate, ng/J (lb/MMBtu);}$

$E_w = \text{SO}_2 \text{ concentration in fuels other than coal and oil combusted in the affected facility, as determined by fuel sampling and analysis procedures in Method 9 of appendix A of this part, ng/J (lb/MMBtu). The value } E_w \text{ for each fuel lot is used for each hourly average during the time that the lot is being combusted. The owner or operator does not have to measure } E_w \text{ if the owner or operator elects to assume } E_w = 0.$

$X_k = \text{Fraction of the total heat input from fuel combustion derived from coal and oil, as determined by applicable procedures in Method 19 of appendix A of this part.}$

(2) The owner or operator of an affected facility that qualifies under the provisions of § 60.42c(c) or (d) (where percent reduction is not required) does not have to measure the parameters E_w or X_k if the owner or operator of the affected facility elects to measure emission rates of the coal or oil using the fuel sampling and analysis procedures under Method 19 of appendix A of this part.

(f) Affected facilities subject to the percent reduction requirements under § 60.42c(a) or (b) shall determine compliance with the SO_2 emission limits under § 60.42c pursuant to paragraphs (d) or (e) of this section, and shall determine compliance with the percent reduction requirements using the following procedures:

(1) If only coal is combusted, the percent of potential SO_2 emission rate is computed using the following formula:

$$\%P_s = 100 \left(1 - \frac{\%R_g}{100} \right) \left(1 - \frac{\%R_f}{100} \right)$$

Where:

$\%P_s = \text{Potential SO}_2 \text{ emission rate, in percent;}$

$\%R_g = \text{SO}_2 \text{ removal efficiency of the control device as determined by Method 19 of appendix A of this part, in percent;}$
and

$\%R_f = \text{SO}_2 \text{ removal efficiency of fuel pretreatment as determined by Method 19 of appendix A of this part, in percent.}$

(2) If coal, oil, or coal and oil are combusted with other fuels, the same procedures required in paragraph (f)(1) of this section are used, except as provided for in the following:

(i) To compute the $\%P_s$, an adjusted $\%R_g$ ($\%R_{go}$) is computed from E_{ao} from paragraph (e)(1) of this section and an adjusted average SO_2 inlet rate (E_{ai}) using the following formula:

$$\%R_{go} = 100 \left(1 - \frac{E_{ao}}{E_{ai}} \right)$$

Where:

$\%R_{go} = \text{Adjusted } \%R_g, \text{ in percent;}$

$E_{ao} = \text{Adjusted } E_{ao}, \text{ ng/J (lb/MMBtu); and}$

$E_{ai} = \text{Adjusted average SO}_2 \text{ inlet rate, ng/J (lb/MMBtu).}$

(ii) To compute E_{ai} , an adjusted hourly SO_2 inlet rate (E_{hi}) is used. The E_{hi} is computed using the following formula:

$$E_{hi} = \frac{E_m - E_w(1 - X_k)}{X_k}$$

Where:

E_{hi} = Adjusted E_{hi} , ng/J (lb/MMBtu);

E_{hi} = Hourly SO_2 inlet rate, ng/J (lb/MMBtu);

E_w = SO_2 concentration in fuels other than coal and oil combusted in the affected facility, as determined by fuel sampling and analysis procedures in Method 19 of appendix A of this part, ng/J (lb/MMBtu). The value E_w for each fuel lot is used for each hourly average during the time that the lot is being combusted. The owner or operator does not have to measure E_w if the owner or operator elects to assume $E_w = 0$; and

X_k = Fraction of the total heat input from fuel combustion derived from coal and oil, as determined by applicable procedures in Method 19 of appendix A of this part.

(g) For oil-fired affected facilities where the owner or operator seeks to demonstrate compliance with the fuel oil sulfur limits under § 60.42c based on shipment fuel sampling, the initial performance test shall consist of sampling and analyzing the oil in the initial tank of oil to be fired in the steam generating unit to demonstrate that the oil contains 0.5 weight percent sulfur or less. Thereafter, the owner or operator of the affected facility shall sample the oil in the fuel tank after each new shipment of oil is received, as described under § 60.46c(d)(2).

(h) For affected facilities subject to § 60.42c(h)(1), (2), or (3) where the owner or operator seeks to demonstrate compliance with the SO_2 standards based on fuel supplier certification, the performance test shall consist of the certification from the fuel supplier, as described in § 60.48c(f), as applicable.

(i) The owner or operator of an affected facility seeking to demonstrate compliance with the SO_2 standards under § 60.42c(c)(2) shall demonstrate the maximum design heat input capacity of the steam generating unit by operating the steam generating unit at this capacity for 24 hours. This demonstration shall be made during the initial performance test, and a subsequent demonstration may be requested at any other time. If the demonstrated 24-hour average firing rate for the affected facility is less than the maximum design heat input capacity stated by the manufacturer of the affected facility, the demonstrated 24-hour average firing rate shall be used to determine the annual capacity factor for the affected facility; otherwise, the maximum design heat input capacity provided by the manufacturer shall be used.

(j) The owner or operator of an affected facility shall use all valid SO_2 emissions data in calculating $\%P_s$ and E_{ho} under paragraphs (d), (e), or (f) of this section, as applicable, whether or not the minimum emissions data requirements under § 60.46c(f) are achieved. All valid emissions data, including valid data collected during periods of startup, shutdown, and malfunction, shall be used in calculating $\%P_s$ or E_{ho} pursuant to paragraphs (d), (e), or (f) of this section, as applicable.

[72 FR 32759, June 13, 2007, as amended at 74 FR 5091, Jan. 28, 2009]

§ 60.45c Compliance and performance test methods and procedures for particulate matter.

(a) The owner or operator of an affected facility subject to the PM and/or opacity standards under § 60.43c shall conduct an initial performance test as required under § 60.8, and shall conduct subsequent performance tests as requested by the Administrator, to determine compliance with the standards using the following procedures and reference methods, except as specified in paragraph (c) of this section.

(1) Method 1 of appendix A of this part shall be used to select the sampling site and the number of traverse sampling points.

(2) Method 3A or 3B of appendix A-2 of this part shall be used for gas analysis when applying Method 5 or 5B of appendix A-3 of this part or 17 of appendix A-6 of this part.

(3) Method 5, 5B, or 17 of appendix A of this part shall be used to measure the concentration of PM as follows:

(i) Method 5 of appendix A of this part may be used only at affected facilities without wet scrubber systems.

(ii) Method 17 of appendix A of this part may be used at affected facilities with or without wet scrubber systems provided the stack gas temperature does not exceed a temperature of 160 °C (320 °F). The procedures of Sections 8.1 and 11.1 of Method 5B of appendix A of this part may be used in Method 17 of appendix A of this part only if Method 17 of appendix A of this part is used in conjunction with a wet scrubber system. Method 17 of appendix A of this part shall not be used in conjunction with a wet scrubber system if the effluent is saturated or laden with water droplets.

(iii) Method 5B of appendix A of this part may be used in conjunction with a wet scrubber system.

(4) The sampling time for each run shall be at least 120 minutes and the minimum sampling volume shall be 1.7 dry standard cubic meters (dscm) [60 dry standard cubic feet (dscf)] except that smaller sampling times or volumes may be approved by the Administrator when necessitated by process variables or other factors.

(5) For Method 5 or 5B of appendix A of this part, the temperature of the sample gas in the probe and filter holder shall be monitored and maintained at 160 ±14 °C (320±25 °F).

(6) For determination of PM emissions, an oxygen (O₂) or carbon dioxide (CO₂) measurement shall be obtained simultaneously with each run of Method 5, 5B, or 17 of appendix A of this part by traversing the duct at the same sampling location.

(7) For each run using Method 5, 5B, or 17 of appendix A of this part, the emission rates expressed in ng/J (lb/MMBtu) heat input shall be determined using:

(i) The O₂ or CO₂ measurements and PM measurements obtained under this section, (ii) The dry basis F factor, and

(iii) The dry basis emission rate calculation procedure contained in Method 19 of appendix A of this part.

(8) Method 9 of appendix A-4 of this part shall be used for determining the opacity of stack emissions.

(b) The owner or operator of an affected facility seeking to demonstrate compliance with the PM standards under § 60.43c(b)(2) shall demonstrate the maximum design heat input capacity of the steam generating unit by operating the steam generating unit at this capacity for 24 hours. This demonstration shall be made during the initial performance test, and a subsequent demonstration may be requested at any other time. If the demonstrated 24-hour average firing rate for the affected facility is less than the maximum design heat input capacity stated by the manufacturer of the affected facility, the demonstrated 24-hour average firing rate shall be used to determine the annual capacity factor for the affected facility; otherwise, the maximum design heat input capacity provided by the manufacturer shall be used.

(c) In place of PM testing with Method 5 or 5B of appendix A-3 of this part or Method 17 of appendix A-6 of this part, an owner or operator may elect to install, calibrate, maintain, and operate a CEMS for monitoring PM emissions discharged to the atmosphere and record the output of the system. The owner or operator of an affected facility who elects to continuously monitor PM emissions instead of conducting performance testing using Method 5 or 5B of appendix A-3 of this part or Method 17 of appendix A-6 of this part shall install, calibrate, maintain, and operate a CEMS and shall comply with the requirements specified in paragraphs (c)(1) through (c)(14) of this section.

(1) Notify the Administrator 1 month before starting use of the system.

(2) Notify the Administrator 1 month before stopping use of the system.

- (3) The monitor shall be installed, evaluated, and operated in accordance with § 60.13 of subpart A of this part.
- (4) The initial performance evaluation shall be completed no later than 180 days after the date of initial startup of the affected facility, as specified under § 60.8 of subpart A of this part or within 180 days of notification to the Administrator of use of CEMS if the owner or operator was previously determining compliance by Method 5, 5B, or 17 of appendix A of this part performance tests, whichever is later.
- (5) The owner or operator of an affected facility shall conduct an initial performance test for PM emissions as required under § 60.8 of subpart A of this part. Compliance with the PM emission limit shall be determined by using the CEMS specified in paragraph (d) of this section to measure PM and calculating a 24-hour block arithmetic average emission concentration using EPA Reference Method 19 of appendix A of this part, section 4.1.
- (6) Compliance with the PM emission limit shall be determined based on the 24-hour daily (block) average of the hourly arithmetic average emission concentrations using CEMS outlet data.
- (7) At a minimum, valid CEMS hourly averages shall be obtained as specified in paragraph (c)(7)(i) of this section for 75 percent of the total operating hours per 30-day rolling average.
- (i) At least two data points per hour shall be used to calculate each 1-hour arithmetic average.
- (ii) [Reserved]
- (8) The 1-hour arithmetic averages required under paragraph (c)(7) of this section shall be expressed in ng/J or lb/MMBtu heat input and shall be used to calculate the boiler operating day daily arithmetic average emission concentrations. The 1-hour arithmetic averages shall be calculated using the data points required under § 60.13(e)(2) of subpart A of this part.
- (9) All valid CEMS data shall be used in calculating average emission concentrations even if the minimum CEMS data requirements of paragraph (c)(7) of this section are not met.
- (10) The CEMS shall be operated according to Performance Specification 11 in appendix B of this part.
- (11) During the correlation testing runs of the CEMS required by Performance Specification 11 in appendix B of this part, PM and O₂ (or CO₂) data shall be collected concurrently (or within a 30- to 60-minute period) by both the continuous emission monitors and performance tests conducted using the following test methods.
- (i) For PM, Method 5 or 5B of appendix A-3 of this part or Method 17 of appendix A-6 of this part shall be used; and
- (ii) For O₂ (or CO₂), Method 3A or 3B of appendix A-2 of this part, as applicable shall be used.
- (12) Quarterly accuracy determinations and daily calibration drift tests shall be performed in accordance with procedure 2 in appendix F of this part. Relative Response Audit's must be performed annually and Response Correlation Audits must be performed every 3 years.
- (13) When PM emissions data are not obtained because of CEMS breakdowns, repairs, calibration checks, and zero and span adjustments, emissions data shall be obtained by using other monitoring systems as approved by the Administrator or EPA Reference Method 19 of appendix A of this part to provide, as necessary, valid emissions data for a minimum of 75 percent of total operating hours on a 30-day rolling average.
- (14) As of January 1, 2012, and within 90 days after the date of completing each performance test, as defined in § 60.8, conducted to demonstrate compliance with this subpart, you must submit relative accuracy test audit (*i.e.*, reference method) data and performance test (*i.e.*, compliance test) data, except opacity data, electronically to EPA's Central Data Exchange (CDX) by using the Electronic Reporting Tool (ERT) (see http://www.epa.gov/ttn/chief/ert/ert_tool.html/) or other compatible electronic spreadsheet. Only data collected using test methods compatible with ERT are subject to this requirement to be submitted electronically into EPA's WebFIRE database.

(d) The owner or operator of an affected facility seeking to demonstrate compliance under § 60.43c(e)(4) shall follow the applicable procedures under § 60.48c(f). For residual oil-fired affected facilities, fuel supplier certifications are only allowed for facilities with heat input capacities between 2.9 and 8.7 MW (10 to 30 MMBtu/h).

[72 FR 32759, June 13, 2007, as amended at 74 FR 5091, Jan. 28, 2009; 76 FR 3523, Jan. 20, 2011; 77 FR 9463, Feb. 16, 2012]

§ 60.46c Emission monitoring for sulfur dioxide.

(a) Except as provided in paragraphs (d) and (e) of this section, the owner or operator of an affected facility subject to the SO₂ emission limits under § 60.42c shall install, calibrate, maintain, and operate a CEMS for measuring SO₂ concentrations and either O₂ or CO₂ concentrations at the outlet of the SO₂ control device (or the outlet of the steam generating unit if no SO₂ control device is used), and shall record the output of the system. The owner or operator of an affected facility subject to the percent reduction requirements under § 60.42c shall measure SO₂ concentrations and either O₂ or CO₂ concentrations at both the inlet and outlet of the SO₂ control device.

(b) The 1-hour average SO₂ emission rates measured by a CEMS shall be expressed in ng/J or lb/MMBtu heat input and shall be used to calculate the average emission rates under § 60.42c. Each 1-hour average SO₂ emission rate must be based on at least 30 minutes of operation, and shall be calculated using the data points required under § 60.13(h)(2). Hourly SO₂ emission rates are not calculated if the affected facility is operated less than 30 minutes in a 1-hour period and are not counted toward determination of a steam generating unit operating day.

(c) The procedures under § 60.13 shall be followed for installation, evaluation, and operation of the CEMS.

(1) All CEMS shall be operated in accordance with the applicable procedures under Performance Specifications 1, 2, and 3 of appendix B of this part.

(2) Quarterly accuracy determinations and daily calibration drift tests shall be performed in accordance with Procedure 1 of appendix F of this part.

(3) For affected facilities subject to the percent reduction requirements under § 60.42c, the span value of the SO₂ CEMS at the inlet to the SO₂ control device shall be 125 percent of the maximum estimated hourly potential SO₂ emission rate of the fuel combusted, and the span value of the SO₂ CEMS at the outlet from the SO₂ control device shall be 50 percent of the maximum estimated hourly potential SO₂ emission rate of the fuel combusted.

(4) For affected facilities that are not subject to the percent reduction requirements of § 60.42c, the span value of the SO₂ CEMS at the outlet from the SO₂ control device (or outlet of the steam generating unit if no SO₂ control device is used) shall be 125 percent of the maximum estimated hourly potential SO₂ emission rate of the fuel combusted.

(d) As an alternative to operating a CEMS at the inlet to the SO₂ control device (or outlet of the steam generating unit if no SO₂ control device is used) as required under paragraph (a) of this section, an owner or operator may elect to determine the average SO₂ emission rate by sampling the fuel prior to combustion. As an alternative to operating a CEMS at the outlet from the SO₂ control device (or outlet of the steam generating unit if no SO₂ control device is used) as required under paragraph (a) of this section, an owner or operator may elect to determine the average SO₂ emission rate by using Method 6B of appendix A of this part. Fuel sampling shall be conducted pursuant to either paragraph (d)(1) or (d)(2) of this section. Method 6B of appendix A of this part shall be conducted pursuant to paragraph (d)(3) of this section.

(1) For affected facilities combusting coal or oil, coal or oil samples shall be collected daily in an as-fired condition at the inlet to the steam generating unit and analyzed for sulfur content and heat content according to the Method 19 of appendix A of this part. Method 19 of appendix A of this part provides procedures for converting these measurements into the format to be used in calculating the average SO₂ input rate.

(2) As an alternative fuel sampling procedure for affected facilities combusting oil, oil samples may be collected from the fuel tank for each steam generating unit immediately after the fuel tank is filled and before any oil is combusted. The owner or operator of the affected facility shall analyze the oil sample to determine the sulfur content of the oil. If a partially empty fuel tank is refilled, a new sample and analysis of the fuel in the tank would be required upon filling. Results of the fuel analysis taken after each new shipment of oil is received shall be used as the daily value when

calculating the 30-day rolling average until the next shipment is received. If the fuel analysis shows that the sulfur content in the fuel tank is greater than 0.5 weight percent sulfur, the owner or operator shall ensure that the sulfur content of subsequent oil shipments is low enough to cause the 30-day rolling average sulfur content to be 0.5 weight percent sulfur or less.

(3) Method 6B of appendix A of this part may be used in lieu of CEMS to measure SO₂ at the inlet or outlet of the SO₂ control system. An initial stratification test is required to verify the adequacy of the Method 6B of appendix A of this part sampling location. The stratification test shall consist of three paired runs of a suitable SO₂ and CO₂ measurement train operated at the candidate location and a second similar train operated according to the procedures in § 3.2 and the applicable procedures in section 7 of Performance Specification 2 of appendix B of this part. Method 6B of appendix A of this part, Method 6A of appendix A of this part, or a combination of Methods 6 and 3 of appendix A of this part or Methods 6C and 3A of appendix A of this part are suitable measurement techniques. If Method 6B of appendix A of this part is used for the second train, sampling time and timer operation may be adjusted for the stratification test as long as an adequate sample volume is collected; however, both sampling trains are to be operated similarly. For the location to be adequate for Method 6B of appendix A of this part 24-hour tests, the mean of the absolute difference between the three paired runs must be less than 10 percent (0.10).

(e) The monitoring requirements of paragraphs (a) and (d) of this section shall not apply to affected facilities subject to § 60.42c(h) (1), (2), or (3) where the owner or operator of the affected facility seeks to demonstrate compliance with the SO₂ standards based on fuel supplier certification, as described under § 60.48c(f), as applicable.

(f) The owner or operator of an affected facility operating a CEMS pursuant to paragraph (a) of this section, or conducting as-fired fuel sampling pursuant to paragraph (d)(1) of this section, shall obtain emission data for at least 75 percent of the operating hours in at least 22 out of 30 successive steam generating unit operating days. If this minimum data requirement is not met with a single monitoring system, the owner or operator of the affected facility shall supplement the emission data with data collected with other monitoring systems as approved by the Administrator.

§ 60.47c Emission monitoring for particulate matter.

(a) Except as provided in paragraphs (c), (d), (e), and (f) of this section, the owner or operator of an affected facility combusting coal, oil, or wood that is subject to the opacity standards under § 60.43c shall install, calibrate, maintain, and operate a continuous opacity monitoring system (COMS) for measuring the opacity of the emissions discharged to the atmosphere and record the output of the system. The owner or operator of an affected facility subject to an opacity standard in § 60.43c(c) that is not required to use a COMS due to paragraphs (c), (d), (e), or (f) of this section that elects not to use a COMS shall conduct a performance test using Method 9 of appendix A-4 of this part and the procedures in § 60.11 to demonstrate compliance with the applicable limit in § 60.43c by April 29, 2011, within 45 days of stopping use of an existing COMS, or within 180 days after initial startup of the facility, whichever is later, and shall comply with either paragraphs (a)(1), (a)(2), or (a)(3) of this section. The observation period for Method 9 of appendix A-4 of this part performance tests may be reduced from 3 hours to 60 minutes if all 6-minute averages are less than 10 percent and all individual 15-second observations are less than or equal to 20 percent during the initial 60 minutes of observation.

(1) Except as provided in paragraph (a)(2) and (a)(3) of this section, the owner or operator shall conduct subsequent Method 9 of appendix A-4 of this part performance tests using the procedures in paragraph (a) of this section according to the applicable schedule in paragraphs (a)(1)(i) through (a)(1)(iv) of this section, as determined by the most recent Method 9 of appendix A-4 of this part performance test results.

(i) If no visible emissions are observed, a subsequent Method 9 of appendix A-4 of this part performance test must be completed within 12 calendar months from the date that the most recent performance test was conducted or within 45 days of the next day that fuel with an opacity standard is combusted, whichever is later;

(ii) If visible emissions are observed but the maximum 6-minute average opacity is less than or equal to 5 percent, a subsequent Method 9 of appendix A-4 of this part performance test must be completed within 6 calendar months from the date that the most recent performance test was conducted or within 45 days of the next day that fuel with an opacity standard is combusted, whichever is later;

(iii) If the maximum 6-minute average opacity is greater than 5 percent but less than or equal to 10 percent, a subsequent Method 9 of appendix A-4 of this part performance test must be completed within 3 calendar months from

the date that the most recent performance test was conducted or within 45 days of the next day that fuel with an opacity standard is combusted, whichever is later; or

(iv) If the maximum 6-minute average opacity is greater than 10 percent, a subsequent Method 9 of appendix A-4 of this part performance test must be completed within 45 calendar days from the date that the most recent performance test was conducted.

(2) If the maximum 6-minute opacity is less than 10 percent during the most recent Method 9 of appendix A-4 of this part performance test, the owner or operator may, as an alternative to performing subsequent Method 9 of appendix A-4 of this part performance tests, elect to perform subsequent monitoring using Method 22 of appendix A-7 of this part according to the procedures specified in paragraphs (a)(2)(i) and (ii) of this section.

(i) The owner or operator shall conduct 10 minute observations (during normal operation) each operating day the affected facility fires fuel for which an opacity standard is applicable using Method 22 of appendix A-7 of this part and demonstrate that the sum of the occurrences of any visible emissions is not in excess of 5 percent of the observation period (*i.e.* , 30 seconds per 10 minute period). If the sum of the occurrence of any visible emissions is greater than 30 seconds during the initial 10 minute observation, immediately conduct a 30 minute observation. If the sum of the occurrence of visible emissions is greater than 5 percent of the observation period (*i.e.*, 90 seconds per 30 minute period), the owner or operator shall either document and adjust the operation of the facility and demonstrate within 24 hours that the sum of the occurrence of visible emissions is equal to or less than 5 percent during a 30 minute observation (*i.e.*, 90 seconds) or conduct a new Method 9 of appendix A-4 of this part performance test using the procedures in paragraph (a) of this section within 45 calendar days according to the requirements in § 60.45c(a)(8).

(ii) If no visible emissions are observed for 10 operating days during which an opacity standard is applicable, observations can be reduced to once every 7 operating days during which an opacity standard is applicable. If any visible emissions are observed, daily observations shall be resumed.

(3) If the maximum 6-minute opacity is less than 10 percent during the most recent Method 9 of appendix A-4 of this part performance test, the owner or operator may, as an alternative to performing subsequent Method 9 of appendix A-4 performance tests, elect to perform subsequent monitoring using a digital opacity compliance system according to a site-specific monitoring plan approved by the Administrator. The observations shall be similar, but not necessarily identical, to the requirements in paragraph (a)(2) of this section. For reference purposes in preparing the monitoring plan, see OAQPS "Determination of Visible Emission Opacity from Stationary Sources Using Computer-Based Photographic Analysis Systems." This document is available from the U.S. Environmental Protection Agency (U.S. EPA); Office of Air Quality and Planning Standards; Sector Policies and Programs Division; Measurement Policy Group (D243-02), Research Triangle Park, NC 27711. This document is also available on the Technology Transfer Network (TTN) under Emission Measurement Center Preliminary Methods.

(b) All COMS shall be operated in accordance with the applicable procedures under Performance Specification 1 of appendix B of this part. The span value of the opacity COMS shall be between 60 and 80 percent.

(c) Owners and operators of an affected facilities that burn only distillate oil that contains no more than 0.5 weight percent sulfur and/or liquid or gaseous fuels with potential sulfur dioxide emission rates of 26 ng/J (0.060 lb/MMBtu) heat input or less and that do not use a post-combustion technology to reduce SO₂ or PM emissions and that are subject to an opacity standard in § 60.43c(c) are not required to operate a COMS if they follow the applicable procedures in § 60.48c(f).

(d) Owners or operators complying with the PM emission limit by using a PM CEMS must calibrate, maintain, operate, and record the output of the system for PM emissions discharged to the atmosphere as specified in § 60.45c(c). The CEMS specified in paragraph § 60.45c(c) shall be operated and data recorded during all periods of operation of the affected facility except for CEMS breakdowns and repairs. Data is recorded during calibration checks, and zero and span adjustments.

(e) Owners and operators of an affected facility that is subject to an opacity standard in § 60.43c(c) and that does not use post-combustion technology (except a wet scrubber) for reducing PM, SO₂ , or carbon monoxide (CO) emissions, burns only gaseous fuels or fuel oils that contain less than or equal to 0.5 weight percent sulfur, and is operated such that emissions of CO discharged to the atmosphere from the affected facility are maintained at levels less than or equal to 0.15 lb/MMBtu on a boiler operating day average basis is not required to operate a COMS. Owners and

operators of affected facilities electing to comply with this paragraph must demonstrate compliance according to the procedures specified in paragraphs (e)(1) through (4) of this section; or

(1) You must monitor CO emissions using a CEMS according to the procedures specified in paragraphs (e)(1)(i) through (iv) of this section.

(i) The CO CEMS must be installed, certified, maintained, and operated according to the provisions in § 60.58b(i)(3) of subpart Eb of this part.

(ii) Each 1-hour CO emissions average is calculated using the data points generated by the CO CEMS expressed in parts per million by volume corrected to 3 percent oxygen (dry basis).

(iii) At a minimum, valid 1-hour CO emissions averages must be obtained for at least 90 percent of the operating hours on a 30-day rolling average basis. The 1-hour averages are calculated using the data points required in § 60.13(h)(2).

(iv) Quarterly accuracy determinations and daily calibration drift tests for the CO CEMS must be performed in accordance with procedure 1 in appendix F of this part.

(2) You must calculate the 1-hour average CO emissions levels for each steam generating unit operating day by multiplying the average hourly CO output concentration measured by the CO CEMS times the corresponding average hourly flue gas flow rate and divided by the corresponding average hourly heat input to the affected source. The 24-hour average CO emission level is determined by calculating the arithmetic average of the hourly CO emission levels computed for each steam generating unit operating day.

(3) You must evaluate the preceding 24-hour average CO emission level each steam generating unit operating day excluding periods of affected source startup, shutdown, or malfunction. If the 24-hour average CO emission level is greater than 0.15 lb/MMBtu, you must initiate investigation of the relevant equipment and control systems within 24 hours of the first discovery of the high emission incident and, take the appropriate corrective action as soon as practicable to adjust control settings or repair equipment to reduce the 24-hour average CO emission level to 0.15 lb/MMBtu or less.

(4) You must record the CO measurements and calculations performed according to paragraph (e) of this section and any corrective actions taken. The record of corrective action taken must include the date and time during which the 24-hour average CO emission level was greater than 0.15 lb/MMBtu, and the date, time, and description of the corrective action.

(f) An owner or operator of an affected facility that is subject to an opacity standard in § 60.43c(c) is not required to operate a COMS provided that the affected facility meets the conditions in either paragraphs (f)(1), (2), or (3) of this section.

(1) The affected facility uses a fabric filter (baghouse) as the primary PM control device and, the owner or operator operates a bag leak detection system to monitor the performance of the fabric filter according to the requirements in section § 60.48Da of this part.

(2) The affected facility uses an ESP as the primary PM control device, and the owner or operator uses an ESP predictive model to monitor the performance of the ESP developed in accordance and operated according to the requirements in section § 60.48Da of this part.

(3) The affected facility burns only gaseous fuels and/or fuel oils that contain no greater than 0.5 weight percent sulfur, and the owner or operator operates the unit according to a written site-specific monitoring plan approved by the permitting authority. This monitoring plan must include procedures and criteria for establishing and monitoring specific parameters for the affected facility indicative of compliance with the opacity standard. For testing performed as part of this site-specific monitoring plan, the permitting authority may require as an alternative to the notification and reporting requirements specified in §§ 60.8 and 60.11 that the owner or operator submit any deviations with the excess emissions report required under § 60.48c(c).

[72 FR 32759, June 13, 2007, as amended at 74 FR 5091, Jan. 28, 2009; 76 FR 3523, Jan. 20, 2011; 77 FR 9463, Feb. 16, 2012]

§ 60.48c Reporting and recordkeeping requirements.

(a) The owner or operator of each affected facility shall submit notification of the date of construction or reconstruction and actual startup, as provided by § 60.7 of this part. This notification shall include:

(1) The design heat input capacity of the affected facility and identification of fuels to be combusted in the affected facility.

(2) If applicable, a copy of any federally enforceable requirement that limits the annual capacity factor for any fuel or mixture of fuels under § 60.42c, or § 60.43c.

(3) The annual capacity factor at which the owner or operator anticipates operating the affected facility based on all fuels fired and based on each individual fuel fired.

(4) Notification if an emerging technology will be used for controlling SO₂ emissions. The Administrator will examine the description of the control device and will determine whether the technology qualifies as an emerging technology. In making this determination, the Administrator may require the owner or operator of the affected facility to submit additional information concerning the control device. The affected facility is subject to the provisions of § 60.42c(a) or (b)(1), unless and until this determination is made by the Administrator.

(b) The owner or operator of each affected facility subject to the SO₂ emission limits of § 60.42c, or the PM or opacity limits of § 60.43c, shall submit to the Administrator the performance test data from the initial and any subsequent performance tests and, if applicable, the performance evaluation of the CEMS and/or COMS using the applicable performance specifications in appendix B of this part.

(c) In addition to the applicable requirements in § 60.7, the owner or operator of an affected facility subject to the opacity limits in § 60.43c(c) shall submit excess emission reports for any excess emissions from the affected facility that occur during the reporting period and maintain records according to the requirements specified in paragraphs (c)(1) through (3) of this section, as applicable to the visible emissions monitoring method used.

(1) For each performance test conducted using Method 9 of appendix A-4 of this part, the owner or operator shall keep the records including the information specified in paragraphs (c)(1)(i) through (iii) of this section.

(i) Dates and time intervals of all opacity observation periods;

(ii) Name, affiliation, and copy of current visible emission reading certification for each visible emission observer participating in the performance test; and

(iii) Copies of all visible emission observer opacity field data sheets;

(2) For each performance test conducted using Method 22 of appendix A-4 of this part, the owner or operator shall keep the records including the information specified in paragraphs (c)(2)(i) through (iv) of this section.

(i) Dates and time intervals of all visible emissions observation periods;

(ii) Name and affiliation for each visible emission observer participating in the performance test;

(iii) Copies of all visible emission observer opacity field data sheets; and

(iv) Documentation of any adjustments made and the time the adjustments were completed to the affected facility operation by the owner or operator to demonstrate compliance with the applicable monitoring requirements.

(3) For each digital opacity compliance system, the owner or operator shall maintain records and submit reports according to the requirements specified in the site-specific monitoring plan approved by the Administrator

(d) The owner or operator of each affected facility subject to the SO₂ emission limits, fuel oil sulfur limits, or percent reduction requirements under § 60.42c shall submit reports to the Administrator.

(e) The owner or operator of each affected facility subject to the SO₂ emission limits, fuel oil sulfur limits, or percent reduction requirements under § 60.42c shall keep records and submit reports as required under paragraph (d) of this section, including the following information, as applicable.

(1) Calendar dates covered in the reporting period.

(2) Each 30-day average SO₂ emission rate (ng/J or lb/MMBtu), or 30-day average sulfur content (weight percent), calculated during the reporting period, ending with the last 30-day period; reasons for any noncompliance with the emission standards; and a description of corrective actions taken.

(3) Each 30-day average percent of potential SO₂ emission rate calculated during the reporting period, ending with the last 30-day period; reasons for any noncompliance with the emission standards; and a description of the corrective actions taken.

(4) Identification of any steam generating unit operating days for which SO₂ or diluent (O₂ or CO₂) data have not been obtained by an approved method for at least 75 percent of the operating hours; justification for not obtaining sufficient data; and a description of corrective actions taken.

(5) Identification of any times when emissions data have been excluded from the calculation of average emission rates; justification for excluding data; and a description of corrective actions taken if data have been excluded for periods other than those during which coal or oil were not combusted in the steam generating unit.

(6) Identification of the F factor used in calculations, method of determination, and type of fuel combusted.

(7) Identification of whether averages have been obtained based on CEMS rather than manual sampling methods.

(8) If a CEMS is used, identification of any times when the pollutant concentration exceeded the full span of the CEMS.

(9) If a CEMS is used, description of any modifications to the CEMS that could affect the ability of the CEMS to comply with Performance Specifications 2 or 3 of appendix B of this part.

(10) If a CEMS is used, results of daily CEMS drift tests and quarterly accuracy assessments as required under appendix F, Procedure 1 of this part.

(11) If fuel supplier certification is used to demonstrate compliance, records of fuel supplier certification as described under paragraph (f)(1), (2), (3), or (4) of this section, as applicable. In addition to records of fuel supplier certifications, the report shall include a certified statement signed by the owner or operator of the affected facility that the records of fuel supplier certifications submitted represent all of the fuel combusted during the reporting period.

(f) Fuel supplier certification shall include the following information:

(1) For distillate oil:

(i) The name of the oil supplier;

(ii) A statement from the oil supplier that the oil complies with the specifications under the definition of distillate oil in § 60.41c; and

(iii) The sulfur content or maximum sulfur content of the oil.

(2) For residual oil:

(i) The name of the oil supplier;

(ii) The location of the oil when the sample was drawn for analysis to determine the sulfur content of the oil, specifically including whether the oil was sampled as delivered to the affected facility, or whether the sample was drawn from oil in storage at the oil supplier's or oil refiner's facility, or other location;

(iii) The sulfur content of the oil from which the shipment came (or of the shipment itself); and

(iv) The method used to determine the sulfur content of the oil.

(3) For coal:

(i) The name of the coal supplier;

(ii) The location of the coal when the sample was collected for analysis to determine the properties of the coal, specifically including whether the coal was sampled as delivered to the affected facility or whether the sample was collected from coal in storage at the mine, at a coal preparation plant, at a coal supplier's facility, or at another location. The certification shall include the name of the coal mine (and coal seam), coal storage facility, or coal preparation plant (where the sample was collected);

(iii) The results of the analysis of the coal from which the shipment came (or of the shipment itself) including the sulfur content, moisture content, ash content, and heat content; and

(iv) The methods used to determine the properties of the coal.

(4) For other fuels:

(i) The name of the supplier of the fuel;

(ii) The potential sulfur emissions rate or maximum potential sulfur emissions rate of the fuel in ng/J heat input; and

(iii) The method used to determine the potential sulfur emissions rate of the fuel.

(g)(1) Except as provided under paragraphs (g)(2) and (g)(3) of this section, the owner or operator of each affected facility shall record and maintain records of the amount of each fuel combusted during each operating day.

(2) As an alternative to meeting the requirements of paragraph (g)(1) of this section, the owner or operator of an affected facility that combusts only natural gas, wood, fuels using fuel certification in § 60.48c(f) to demonstrate compliance with the SO₂ standard, fuels not subject to an emissions standard (excluding opacity), or a mixture of these fuels may elect to record and maintain records of the amount of each fuel combusted during each calendar month.

(3) As an alternative to meeting the requirements of paragraph (g)(1) of this section, the owner or operator of an affected facility or multiple affected facilities located on a contiguous property unit where the only fuels combusted in any steam generating unit (including steam generating units not subject to this subpart) at that property are natural gas, wood, distillate oil meeting the most current requirements in § 60.42C to use fuel certification to demonstrate compliance with the SO₂ standard, and/or fuels, excluding coal and residual oil, not subject to an emissions standard (excluding opacity) may elect to record and maintain records of the total amount of each steam generating unit fuel delivered to that property during each calendar month.

(h) The owner or operator of each affected facility subject to a federally enforceable requirement limiting the annual capacity factor for any fuel or mixture of fuels under § 60.42c or § 60.43c shall calculate the annual capacity factor individually for each fuel combusted. The annual capacity factor is determined on a 12-month rolling average basis with a new annual capacity factor calculated at the end of the calendar month.

(i) All records required under this section shall be maintained by the owner or operator of the affected facility for a period of two years following the date of such record.

(j) The reporting period for the reports required under this subpart is each six-month period. All reports shall be submitted to the Administrator and shall be postmarked by the 30th day following the end of the reporting period.

[72 FR 32759, June 13, 2007, as amended at 74 FR 5091, Jan. 28, 2009]

**Indiana Department of Environmental Management
Office of Air Quality**

Addendum to the Technical Support Document (ATSD) for a
Federally Enforceable State Operating Permit Renewal

Source Background and Description
--

Source Name: Source Location: County: SIC Code: Permit Renewal No.: Permit Reviewer:	Metalworking Lubricants Company 1509 South Senate Avenue, Indianapolis, IN 46225 Marion 2992 F097-32513-00139 Julie Alexander
---	--

On November 17, 2014, the Office of Air Quality (OAQ) had a notice published in the Indianapolis Star, Indianapolis, Indiana, stating that Metalworking Lubricants Company had applied for a Federally Enforceable State Operating Permit Renewal. The notice also stated that the OAQ proposed to issue a Federally Enforceable State Operating Permit Renewal for this operation and provided information on how the public could review the proposed permit and other documentation. Finally, the notice informed interested parties that there was a period of thirty (30) days to provide comments on whether or not this permit should be issued as proposed.

A number of comments were submitted requesting a public hearing and on February 16, 2015 a public hearing was held at Emmerich Manual High School, Mini Auditorium. The public notice period was extended to February 23, 2015.

IDEM, OAQ received written comments during the public comment period and testimony from the public during the public hearing. IDEM, OAQ has summarized and consolidated the comments received during the public comment period and the public hearing.

The Technical Support Document (TSD) is used by IDEM, OAQ for historical purposes. IDEM, OAQ does not make any changes to the original TSD, but the Permit will have the updated changes. The comments and revised permit language are provided below with deleted language as ~~strikeouts~~ and new language **bolded**.

Comments Requesting a Public Hearing

Comment #1:

On December 4, 2014, Dr. William Beranek, Jr., on behalf of the Marion County Local Emergency Planning Committee (LEPC), submitted the following comment:

The Marion County Local Emergency Planning Committee (LEPC) requests that the Indiana Department of Environmental Management Office of Air Quality hold a public hearing on the proposed Metalworking Lubricants Company federally enforceable state operating permit (FESOP) renewal.

This is a permit of great health and public safety importance to the community.

Comment #2:

On December 10, 2014, Tom Dale, submitted the following comment:

Julie, I have been running a business in this area for 30+ years. The stench in this area has to stop. I request that a hearing be schedule with the Metalworking Lubricants Co. asap on the new permit. What can I do as an individual business owner and taxpayer to get them to stop emitting this odor? I'm also a member of the Stadium Village Business Association, together we should be able to convince IDEM that controls and emission standards be brought up to date or else they need to cease to operate.

Comment #3:

On December 17, 2014, Mitra Parsapour, submitted the following comment:

I am writing to request that IDEM hold a public hearing to review Metalworking Lubricants Company's air permit renewal.

For 14 years, I have lived and worked in downtown Indianapolis.

And for all of those years I have suffered from asthma, migraines, allergies, and disruptions to my daily life and routine due to the air contaminants released by Metalworking Lubricants.

More recently, I recorded the most obvious events via the IDEM complaint form online, so you should have an ample record of my contact with you since 2013.

In the midst of our city's growth and attempts to appeal to a younger, more health-conscious crowd, with our trails, bike hub, bicycle rentals, new retail shops, residences, and sports attractions, Metalworking Lubricants remains the unconscionable elephant in the room. I cannot, for one, recommend in good conscience, that any of my friends, family, clients, or businesses relocate to downtown or even Indianapolis until the city and state show some level of commitment to prohibiting this unrelenting pollution from occurring.

My own concern is not about odor, nor about the similarity to the natural gas smell & resulting emergency-response debacle that occurs each time although those are in themselves valid safety concerns. I am concerned about toxicity and air contaminants and how they are affecting residents' & workers' health, well-being, and change in daily life/plans due to the fear of what may be contained in the pollutants that are being emitted by MLC.

A public hearing is hereby requested.

Comment #4:

On December 16, 2014, John Winter, on behalf of the Bates-Hendricks Neighborhood Association, submitted the following comment:

The Bates-Hendricks Neighborhood Association wishes to request a hearing regarding Metalworking Lubricants Company's request for renewal of its Federally Enforceable State Operating Permit (FESOP) for its operations at 1509 S. Senate Avenue, Indianapolis, IN (FESOP renewal number F097-32513-00139).

The Bates-Hendricks Neighborhood Association (BHNA) believes that air in our neighborhood contains pollutants that unreasonably interfere with our residents' enjoyment of life and of their property. We believe these pollutants emanate from Metalworking Lubricants Company facility.

BHNA has worked hard in recent years to build parks and playgrounds, enhance landscaping, encourage outside entities and homeowners to purchase and restore abandoned homes, and otherwise increase the quality of life in our neighborhood. However, the air pollutants we believe come from Metalworking Lubricants Company causes residents and possible residents to question whether it is healthy to live in our neighborhood. Furthermore, it interferes with enjoyment of outdoor activities on private property, or in one of Bates-Hendricks' parks or public spaces.

We also respectfully request that you consider this comment when determining whether to grant a FESOP to Metalworking Lubricants Company, and that you consider which measures can be taken to insure that these air pollutants are not emitted.

Comment #5:

On December 4, 2014, Fr. Larry Janezic, OFM, submitted the following comment:

Thank you for your interest in a public hearing on the air quality of our neighborhood. It is imperative that we continual voice our complaints about Metalworking Lubricants. What worries me is that we may begin to get accustomed to the odor and not distinguish it from a real gas leak. This has happened at the Sacred Heart Parish property.

Please do what you can to schedule a hearing.

Response to Public Hearing Requests
--

As a response to the comments submitted requesting a public hearing, a public hearing was held on February 16, 2015 at Emmerich Manual High School, Mini Auditorium and the public notice period was extended to February 23, 2015.

Comments Received as Testimony During the Public Hearing

Below outlines the main themes of each comment. The transcript from the proceeding is included as Appendix A to this Addendum to the Technical Support Document (ATSD). Responses to these comments have been addressed in the IDEM, OAQ Response sections of this document.

Dr. Bill Beranek:

- Natural gas odor
- Using the scrubber system

Mr. Gene Parsley:

- Operating without a permit
- Probationary permit
- Testing to see what emissions before issuing the permit
- Using the scrubber system
- History of noncompliance
- Change in property zoning
- Natural gas odor

Mr. David Powell:

- Natural gas odor
- Must properly permit Metal Working Lubricants
- Testing to see what emissions before issuing the permit

Ms. Judith Essex:

- Natural gas odor
- Health issue because of the pollution
- Metal Working Lubricants allows trucks to come through the neighborhood where weight restrictions already posted
- Degradation of quality of life

Mr. James Simmons:

- Natural gas odor
- Degradation of quality of life

Ms. Crystal Bridgewater:

- Natural gas odor
- Health issue because of the pollution
- Degradation of quality of life

Mr. Tom Dale:

- Natural gas odor
- Degradation of quality of life

Mr. Tom Beck:

- Must properly permit Metal Working Lubricants
- Natural gas odor

Ms. Allyson Roselee:

- Natural gas odor
- Degradation of quality of life

Mr. James Brightwell:

- Natural gas odor
- Must properly permit Metal Working Lubricants

Mr. Abraham Olson:

- Degradation of quality of life
- Matter of environmental justice

Ms. Lisa Laflin:

- Using the scrubber system
- Natural gas odor
- Health issue because of the pollution
- Degradation of quality of life

Mr. Jeff Veldhof:

- Using the scrubber system
- Natural gas odor
- Health issue because of the pollution
- Degradation of quality of life
- Monitoring in the permit

Representative Mr. Dan Forestal:

- Natural gas odor
- Must properly permit Metal Working Lubricants
- Degradation of quality of life

Representative Mr. Justin Moed:

- Must properly permit Metal Working Lubricants

Mr. Darrell Unsworth:

- Probationary permit
- Natural gas odor
- Must properly permit Metal Working Lubricants
- Health issue because of the pollution

Mr. David Buchanan:

- Natural gas odor

Mr. Richard Pardue:

- Natural gas odor
- Must properly permit Metal Working Lubricants
- Health issue because of the pollution
- Degradation of quality of life
- Matter of environmental justice

Ms. Christine Jack:

- Natural gas odor
- Health issue because of the pollution

Comments From Dr. William Beranek, Jr, on Behalf of LEPC, and IDEM, OAQ Responses
--

On February 23, 2015, Dr. William Beranek, Jr., on behalf of the Marion County Local Emergency Planning Committee (LEPC), submitted comments on the permit. On December 4 and 17, 2014, Dr. William Beranek, Jr., on behalf of LEPC, submitted additional comments.

The Marion County Local Emergency Planning Committee (MCLEPC) has been actively engaged in addressing this air contaminant emission source for over twenty five years. We represent public and private hazardous materials emergency response organizations and supporters that meet bimonthly. We also have a Metal Working Lubricant Work Subcommittee that meets monthly near the plant to track serious emission release events and to work to find solutions to alleviate the situation.

Comment 1:

Page 10 of the Technical Support Document (TSD) (p 90 in pdf file)
The values in the table for HAPs are incorrect. They should state < 25 and < 10.

Response to Comment 1:

IDEM, OAQ concurs. The table reflects the PTE after issuance of the permit and for HAPs the values should be < 25 and < 10.

Comment 2:

Page 13 of TSD (p 93 in pdf file)
The TSD does not discuss the potential applicability or non-applicability of 40 CFR 63 Subpart VVVVVV, also known as the Chemical Manufacturing Area Source rule (CMAS). I do not know whether that rule applies, but it ought to be reviewed and addressed one way or another in the TSD.

Response to Comment 2:

See "IDEM, OAQ Response – Federal Rule Applicability" Section of this document for a detailed response.

Comment 3:

Page 15 of TSD (p 95 in pdf file)

There is not enough information in the TSD to verify if any individual emission unit is less than 25 tons/year or 10 pounds per hour for SO₂ emissions. Emissions from individual emission units are not provided. I would request that IDEM provide a more detailed justification. There might be enough information in the application, but it is not clear in the TSD.

There is not enough information in the TSD to verify if all the emission units have less than 25 tons per year of potential emissions of VOC. An overall value for VOC emissions is provided, but not a breakdown by tank. I would ask IDEM to provide a more detailed justification.

Response to Comment 3:

Appendix B to this document, Addendum to the Technical Support Document, contains a detailed analysis of the sampled lab results submitted by Metalworking Lubricants Company.

The majority of VOC emissions are expected to occur from the heated production and storage tanks located at the source.

To calculate the potential VOC emissions from a single tank, tanks were grouped according to the number of turnovers. The potential emissions of VOC were then calculated for the tank with the largest capacity within each of the groups, representing the maximum possible tank throughput, and therefore, maximum potential VOC emissions. The potential emissions for the representative tanks, prior to consideration of VOC reduction at the scrubber, resulted in maximum potential VOC emissions of 15.94 tons per year. Therefore, the requirements 326 IAC 8-1-6 (BACT) are not applicable to any of the tanks at the source. Appendix B to this document, Addendum to the Technical Support Document, contains a detailed analysis supporting this calculation.

Any emission unit that combusts a fossil fuel is potentially regulated by Article 7 if its potential to emit SO₂ is greater than 25 tons per year or 10 pounds per hour. The combustion units at this source combust either natural gas or diesel and have the potential to emit less than these thresholds, therefore, 326 IAC 7 does not apply to this source.

Comment 4:

Page 51 of the TSD (p 131 in pdf file)

D.1.4 - SO₂ and HAPs should be added to the sentence. As written, it only refers to VOC. D.1.5(a), (b), and (c) should be re-written into two sentences so that it is clear that testing is required BOTH within 180 days of permit issuance AND every 2.5 years. As it is the phrases are compacted together in a way that makes it hard to read. It would be most easily improved if each one of these terms were broken down into two sentences instead of one long awkward sentence.

Response to Comment 4:

Testing Condition D.1.5 states that testing is required not later 180 after issuance of the permit and at least once every 2.5 years from the most recent valid compliance test. This language is standard for the frequency of testing required. Therefore, no change will be made to Condition D.1.5.

Condition D.1.4 has been revised as follows:

D.1.4 SO₂, VOC, and HAPs Control

In order to insure compliance with Condition D.1.1, the scrubber system serving the tanks for **SO₂, VOC, and HAP** control shall be in operation and control emissions from the tanks at all times the tanks are operating or holding liquid.

Comment 5:

Pages 53 through 56 of the TSD (p 133 of pdf file)

These mass balance equations are incorrect. They omit the amount of pollutant that passes through the scrubber. As they are written, they only determine the lost (i.e. fugitive?) emissions that never get to the scrubber. We need both the fugitive and the amount that gets past the scrubber.

In addition, the equations need to adjust for any time periods when the CEMS are not collecting data, or the scrubbers are not in operation. When the CEMS are not collecting data, there should be a data substitution amount used, and when the scrubbers are not operating, they should assume everything is emitted.

Response to Comment 5:

The equation has been updated to make sure that it is properly accounting for the emissions being captured by the scrubber and not just the fugitive emissions. See "IDEM, OAQ Response – Determination of SO₂, VOC, and HAPs Emissions" Section of this change to the permit.

Comment 6:

Page 56 of the TSD (p 136 of the pdf file)

The permit needs some language that explicitly requires the CEMS to be in operation at all times the facility is in operation, except as provided in Condition D.1.15.

Also, there needs to be a condition that requires exhaust flow monitoring so that mass emission rates through the scrubber can be calculated.

Response to Comment 6:

D.1.10 - Continuous Emissions Monitoring of the permit requires the operation of the SO₂ and VOC CEMS in accordance with the applicable requirements of 326 IAC 3-5.

326 IAC 3-5-2 requires at a minimum that the owner and operator of the monitoring equipment install and maintain the equipment to the specifications set forth in 40 CFR 60, Appendix B. The rule also sets a cycle time for continuous monitoring. The continuous parameter monitoring system must cycle a minimum of one (1) cycle of operation every successive fifteen (15) minutes for VOC and SO₂ measuring.

Condition D.1.10(a) requires the monitoring of the scrubber exhaust stream for SO₂ and VOC ppmv and flow. To clarify the intent, Condition D.1.10(a) has been revised as follows:

D.1.10 Continuous Emissions Monitoring [326 IAC 3-5][326 IAC 2-7-6(1),(6)]

- (a) Pursuant to 326 IAC 3-5 (Continuous Monitoring of Emissions) continuous emission monitoring systems for the scrubber system shall be calibrated, maintained, and operated for measuring the **exhaust flow rate and the ppmv and flow of SO₂ ppmv and VOC ppmv of the scrubber** outlet, which meet all applicable performance specifications of 326 IAC 3-5-2.

Comment 7:

Based on the IDEM staff answers to questions at the Public Meeting on February 16, 2016 about the scrubber there seems to be a serious misunderstanding of the capabilities of the scrubber IDEM has

proposed. The IDEM staff told the citizens that the permit would improve air quality because IDEM would monitor the operation of the scrubber and respond to citizen complaints of severe odor episodes as evidence the scrubber was not working properly. However, a sodium bisulfite scrubber is not designed to absorb or to destroy mercaptans. It is a reducing agent, not an oxidizing agent. The scrubber IDEM has selected is for a completely different purpose than that which the citizens requested at the public hearing. Although some very short chain mercaptans may be water soluble enough for some reduction, a bisulfite scrubber will likely have negligible impact on reduction of the air contaminants into the area (some of which may well be VOCs) that are causing the serious public health and public safety concerns expressed at the hearing. Sodium bi-sulfite may reduce the concentration of sulfur dioxide but the concentration of SO₂ from the facility is unlikely to be contributing significantly to the odor or the short-term health effects. A chlorine scrubber or an RTO would likely be far more effective at reduction of VOCs, HAPs and those odor-causing chemicals. With proper design to reduce water vapor, a properly operated carbon adsorption unit could be beneficial.

Response to Comment 7:

Metal Working Lubricants has confirmed that they will be using hypochlorite as the reagent instead of sodium bi-sulfite injection. For a more detailed response, see "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

Comment 8:

Does IDEM consider the odor of the released air contaminants to be an indicator of failure of the scrubber according to B.12 of the proposed permit in regard to the emergency provision for the "technology-based emission limitation?"

Response to Comment 8:

Odor can be an indicator of released air contaminants. However it is not, in and of itself, a definitive indication of scrubber failure. The permit requires continuous monitoring of SO₂ and VOC scrubber outlet emissions via CEMS, daily monitoring of the hypochlorite injection rate, and provisions for additional monitoring when a CEMS is not operating properly. The source should consider all available parameters when determining the applicability of the provisions under Condition B.12 – Emergency Provisions [326 IAC 2-8-12].

Comment 9:

We appreciate the attention that IDEM has given to crafting this permit. We hope the final version is practical and effective for the neighbors who have long-suffered public health and public safety harm due to the air contaminants emitted. We hope that the company is able to comply and that IDEM is able to enforce compliance,

The Marion County LEPC would be pleased to assist wherever we can.

Response to Comment 9:

IDEM thanks Dr. William Beranek, Jr, on Behalf of LEPC, for participating in the public process by providing written comment on the proposed FESOP.

Comment 10:

We strongly support the requirement for treatment of emitted air contaminants from the source.

It is not clear to us the technical justification for IDEM's changing the oxidant in the scrubber to sodium bisulfite from the hypochlorite in the current EPS-approved FESOP.

We believe a thermal oxidizer or activated carbon system is more effective for VOC and volatile HAPs

but if a water-based scrubber is to be used, we consider the current hypochlorite scrubber is more effective than bisulfite.

Response to Comment 10:

See "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

Comment 11:

The TSD gives inadequate justification for why NSPS Kb is not applicable. A statement is made that the vapor pressure is not high enough to trigger the requirements, but it does not state at which temperature the vapor pressure was estimated for IDEM to make its determination. The technical support document should have this determination documented for each applicable tank on site.

Response to Comment 11:

The vapor pressure was estimated for a liquid at 210⁰F. See "IDEM, OAQ Response – Federal Rule Applicability" Section of this document for a detailed response.

Comment 12:

At D.1.11 in the FESOP, the lower end of the pressure drop range for adequate operation of the scrubber should be one (1) inch, not zero (0) inch as proposed in the renewed permit.

Because of the observations documented in the November 2013 USEPA NOV (i.e., failure to maintain records of operation of the scrubber as required in the current FESOP), we request that the scrubber compliance measurement be continuous and remotely reported in real-time to authorized government representatives.

Response to Comment 12:

See "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

Comment 13:

All VOCs and volatile HAPs in all tanks and process units should be collected by vent ducts and directed to the scrubber. This is a better method to measure annual emissions than a mass balance calculation based on regular measurements of VOC and HAP constituents in waste oil/water solutions as inputs, additives and liquid product. The proposed mass balance technique has serious technical limitations including detection limitations, the difficult if not impossible task to correlate a constituent in a waste heterogeneous liquid to a VOC/HAP emission with different volatilities, and the lack of accounting for constituents created during processing.

Response to Comment 13:

Appendix B to this document, Addendum to the Technical Support Document, contains a detailed analysis of the sampled lab results submitted by Metalworking Lubricants Company. Of note is that IDEM, OAQ has set all the detection levels to 0, unless the analysis detected constituents of concern in the outgoing products. In these samples, the levels found in the additives were not provided. To account for the contribution of any additives, the detect level was used. Based on this information, the FESOP was written to contain limits to insure that Metalworking Lubricants' emissions remain below 100 tons/year. One such limit is the maximum operating temperature limit for the tanks. The tanks are not permitted to operate at a temperature exceeding 210⁰F. This temperature must be maintained while testing the incoming waste and products to insure that only the VOC/HAPs that volatilize will be counted in the mass balance equation and that any constituents created at this temperature are accounted for.

The mass balance calculation used in the permit is the most conservative way to calculate emissions from the tanks. The three main elements of the mass balance calculation are; the input, the output and the scrubber control efficiency.

The input element of the calculation is the most important part. All products entering the facility must be sampled; this allows a total picture of what is coming in to the facility. Metalworking Lubricants also has to include an accounting of the sulfur, VOC or HAPs contained in the additives. These two elements allow for an accounting of the emissions from the tanks, even those not vented to the scrubber and source-wide fugitive emissions.

The permit also allows Metalworking Lubricants to take credit for the HAP, VOC and/or sulfur contained in the product shipped from the plant. These values can be subtracted from the input value.

The final factor of the equation involves the control efficiency of the scrubber. Efficiency factors are determined by using source conducted VOC, HAP, and SO₂ stack testing and the quantification of outlet VOC and SO₂ emissions as detected by CEMs. This methodology allows for only the emissions that are controlled by the scrubber to be used in calculating any allowance for the operation of controls. The updated equation insures that emissions being captured by the scrubber are properly quantified. See "IDEM, OAQ Response – Determination of SO₂, VOC, and HAPs Emissions" Section of this change to the permit.

To take reduction credit for HAPs removal at the scrubber, Metalworking Lubricants is required to consider all input VOCs in the mass balance equation to be a single HAP. In the mass balance equation, the control efficiency is set to a conservatively low static number that cannot be increased, but may only be changed to a lower value based on testing results. This methodology insures a conservative emission reduction factor.

Comment 14:

We request that the IDEM enter into a formal agreement with the City of Indianapolis Department of Code Enforcement and the Marion County Public Health Department to enter the property to collect facts and finding for IDEM with respect to compliance with permit conditions. If past operation is a predictor of future operation, from time to time through the year there could be evidence detected by many citizens and local officials of the failure to operate the scrubber that can only be investigated immediately. IDEM staff procedures are not designed for immediate response to an incident even during business hours much less for times outside IDEM staff working hours. For IDEM to engage in such a relationship with local government for air pollution protection is encouraged by State statute and our preference is that these two agencies be written into the permit under authorized representatives.

Response to Comment 14:

See "IDEM, OAQ Response – Local Government as Authorized Representative" Section of this document for a detailed response.

Comment 15:

A record requirement should be added to D.1.16 requiring the permittee to maintain a current site plan which identifies location, ID, vents, capacity, date installed and use for each tank. Terminology of tanks, processing units, driers, etc. should be rewritten after a permit-writer site visit to be internally consistent.

Response to Comment 15:

See "IDEM, OAQ Response – Tank Location" Section of this document for a detailed response.

Comment 16:

Determining test conditions is difficult with a source that processes waste products with characteristics that change daily. To encourage the appropriate quality of waste for testing the system, we request that the following condition be added:

"The permittee shall not process any products with VOC, HAP or sulfur content greater than those present during testing of the scrubber."

Response to Comment 16:

Testing is required to be conducted when the process is operating at a minimum of ninety-five percent (95%) of its capacity. For HAPS it is up to the source to demonstrate, and IDEM Compliance and Enforcement Branch (CEB) to verify, that the materials processed are "worst-case". The test protocol must address this before CEB can approve the protocol.

Comment 17:

The facility and all of its appurtenances that are potential VOC and HAPs emitters should be identified and included in permit.

Response to Comment 17:

Based on the information provided from Metal Working Lubricants and a number of IDEM and EPA site visits, IDEM has included all VOC and HAPs emitters in the current draft permit. Any change in the number and type of emission units will require a change to the permit and an application to be submitted to IDEM, OAQ.

Comment 18:

We do take issue in the strongest terms of IDEM's explicit refusal to acknowledge it has legal authority to address an air contaminant with an odor that interferes unreasonably with the enjoyment of life or property.

In the situation of Metal Working Lubricants, not only are unreasonable odors released but for over twenty-five years air contaminants with an odor that mimics the sulfurous odorant added to natural gas have been periodically released every year. At those times small or large areas of the Central Indianapolis area have been inundated with what appears to many citizens as a natural gas leak. That disrupts the lives of residents, manufacturing facilities, hospitals, hotels and downtown businesses. Tens or hundreds of false alarm calls to the fire department and gas company tie up critical resources that need to be deployed to protect public safety. After years of false alarms, many neighbors of the plant cannot use the odor of natural gas as an alert for a leak because they assume any natural gas odor is from the facility.

Even the IDEM air pollution control program staff evacuated its downtown offices in one incident. Metal Working Lubricants shut down its operations the week before the 2012 Super Bowl at the request of the mayor to avoid disruption to that event.

The emissions from this facility for a particular set of air contaminants pose a major public safety threat to Indianapolis.

We understand that the federal government has no specific odor regulations, although the federal air pollution control guidance document AP 42 does describe equipment to control odor. We also understand that neither the Air Pollution Control Board nor the Environmental Rules Board has adopted specific odor regulations. Although in the 1990's, IDEM did devote an intense multi-year effort to prepare a proposed odor regulation for Air Pollution Control Board adoption in order to make its task easier to regulate odors by permit conditions. Because the particular proposed regulation was so far-reaching and subjective, that proposed rule was not adopted. As a result IDEM addressed

odors at the time in rendering plant permits by such means as requiring regular good housekeeping to clean surfaces of decaying matter.

Though the preamble to the proposed renewal permit states that "IDEM does not have legal authority to regulate zoning, odor or noise," it is clear that IDEM has statutory authority to control odors if the odors are of an intensity, type and duration to interfere unreasonably with the enjoyment of life or property. Not only does it have authority but it has a statutory obligation to do just that. One way to affect that authority and obligation is to craft a proposed reasonable, practical, cost-effective regulation for the Board to adopt. Another way to affect that statutory authority is to act directly with orders and permit conditions as appropriate.

Indiana Statute Citations:

IC 13-17-1-1 Sec. 1. **It is the intent and purpose of air pollution control laws to maintain the purity of the air resource of Indiana, which shall be consistent with protection of the public health and welfare and the public enjoyment of the air resource, physical property** and other resources, flora and fauna, maximum employment, and full industrial development of Indiana. The board and **the department shall safeguard the air resource through the prevention, abatement, and control of air pollution by all practical and economically feasible methods.**

IC 13-11-2-5 "Air pollution" Sec. 5. "Air pollution", for purposes of air pollution control laws and environmental management laws, means the presence in or the threatened discharge into the atmosphere of **one (1) or more contaminants in sufficient quantities and of the characteristics and duration that:** (1) is injurious to or threatens to be injurious to human health, plant or animal life, or property; or (2) **interferes unreasonably with the enjoyment of life or property.** As added by P.L.1-1996, SEC.1. IC 13-11-2-6

IC 13-11-2-42 Sec. 42. **"Contaminant"**, for purposes of environmental management laws, **means** any solid, semi-solid, liquid, or gaseous matter, or any odor, radioactive material, pollutant (as defined by the Federal Water Pollution Control Act (33 U.S.C. 1251 et seq.), as in effect on January 1, 1989), hazardous waste (as defined in the federal Solid Waste Disposal Act (42 U.S.C. 6901 et seq.), as in effect on January 1, 1989), any constituent of a hazardous waste, or any combination of the items described in this section, **from whatever source, that:** (1) is injurious to human health, plant or animal life, or property; (2) **interferes unreasonably with the enjoyment of life or property;** or (3) otherwise violates: (A) environmental management laws; or (B) rules adopted under environmental management laws. The term includes chemicals used in the illegal manufacture of a controlled substance (as defined in IC 35-48-1-9) or an immediate precursor (as defined in IC 35-48-1-17) of a controlled substance, and waste produced from the illegal manufacture of a controlled substance or an immediate precursor of the controlled substance. As added by P.L.1-1996, SEC.1. Amended by P.L.2-1998, SEC.44; P.L.192-2005, SEC.5.

We would be pleased to offer advice about proper air contaminant controls for this particular objective.

Response to Comment 18:

See "IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic" Section of this document for a detailed response.

Comments From Tim Falvey and IDEM, OAQ Responses

On February 12, 2015, Tim Falvey, submitted the following comment:

Comment 1:

This letter is to provide public input for the Metalworking Lubricants Company permit F097-32513-00139.

For the last eight (8) years I have owned a home at 1461 N. Alabama in the Old Northside (ONS). The resurgence of the ONS, as well as other historic neighborhoods downtown, has truly been remarkable. As the density of the urban core increases, the state has to be diligent in its efforts to insure that the downtown "quality of life" is protected from any further degradation, AND take every opportunity to IMPROVE the quality of life now and in the years ahead.

The decision to convert IPL's downtown power plant from coal to natural gas is an example of the tough decisions that need to be made to make our city center a GREAT place to live.

While the power plant is a big, obvious example (who can miss it!), there are many other smaller, less noticeable decisions that IDEM and other agencies can make that, collectively, can dramatically improve the quality of life for those of us living downtown.

A case in point: Permit F097-32513-00139 - Metalworking Lubricants (MWL)

My understanding is this permit is not only a renewal request to continue fouling the air that blows over the downtown on a regular basis, but it seems to indicate that MWL wants to "construct and operate new equipment that will emit air pollutants". Apparently, from the filing, they are intent to INCREASE air pollution that directly affects my quality of life.

For the record: I am OPPOSED to IDEM granting MWL a permit to a) renew the existing permit that allows MWL to pollute the air so close to downtown, and b) construct and operate new equipment that will emit MORE air pollutants.

Please consider my input when deciding NOT to grant this permit for increasing the pollution emitted by MWL.

Response to Comment 1:

Metalworking Lubricants Company is not requesting to construct new equipment. This permitting action clarifies the existing equipment at the source.

See "IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic" Section of this document for a detailed response.

Comments From Jennifer Schick and IDEM, OAQ Responses

On December 17, 2014, Jennifer Schick, on behalf of the City of Indianapolis, Department of Code Enforcement, Bureau of Environmental Services and Department of Public Works, Office of Sustainability, submitted the following comment:

Comment 1:

In section D.1.1 (a) it is stated that VOC, HAPS, and SO2 emissions from the following tanks shall be controlled by the Sodium Bi-sulfite (sic) Scrubber. It is unclear how this will control the HAPs and VOCs. Metalworking Lubricants should provide additional information on how they intend to remove VOCs and HAPs.

Response to Comment 1:

See "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

Comment 2:

For Section D.1, Emission Unit Description, it is unclear why the section begins at (c) as opposed to (a).

Response to Comment 2:

Each Section starts with the emission unit descriptions detailing the units that will be covered in that particular section. The lettering correlates to the descriptions located in Section A.1 and A.2 in order to reduce confusion and help facilitate inspections. The requirements for the two boilers, (a) and (b) in Section A.1, are located in Section D.2. Section D.1 only has the requirements for the tanks, (c) through (q) in Section A.1.

No changes were made as a result of this comment.

Comment 3:

For all the tanks in D.1, Emission Unit Description, a requirement should be added to D.1.16 which would require the Permittee to maintain a current site plan which identifies location, ID, vent, capacity, date installed and use for each tank.

Response to Comment 3:

See "IDEM, OAQ Response – Tank Location" Section of this document for a detailed response.

Comment 4:

For all the tanks in D.1, Emission Unit Description, we would ask IDEM to verify the tanks described in the draft are consistent with what is on site currently and which tanks are being used for each process.

Response to Comment 4:

Based on the information provided from Metal Working Lubricants and a number of IDEM and EPA site visits, IDEM has included all emission units at the source in the current draft permit. Any change in the number and type of emission units will require a change to the permit and an application to be submitted to IDEM, OAQ.

Comment 5:

Under D.1.3, it states, "The scrubber shall be in operation when the dryers and oil processing tanks are in operation." None of the tanks in D.1 are described as dryers or oil processing tanks. Please insure the appropriate tanks are referenced.

Response to Comment 5:

In order to insure the scrubber is controlling emissions properly, Condition D.1.3 has been updated to include the Tank ID's. The permit has been changed as follows:

- D.1.3 Scrubber Operation [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]
-
- The scrubber shall be in operation when **P1, P2, P3, P4, P5, P6, P7, P8, P9, P10, P11, P12, P13, P14, P15, SHT2, W8, D1, D2, D3, D4, D5, K1, K2, and K3** the dryers and oil processing tanks are in operation.

Comment 6:

D.1.5 Testing Requirements states, "Testing shall be conducted in accordance with the provisions of 326 IAC 3-6 (Source Sampling Procedures)". However, it is unclear from the permit which product(s) would generate "worst case" short term emissions. The permit should establish maximum VOC, HAP and sulfur content limitations based on products used for testing. Suggested language could read, "The Permittee shall not process any products with VOC, HAP or sulfur contents greater than those established during testing."

Response to Comment 6:

Testing is required to be conducted when the process is operating at a minimum of ninety-five percent (95%) of its capacity. For HAPS it is up to the source to demonstrate, and IDEM Compliance and Enforcement Branch (CEB) to verify, that the materials processed are "worst-case". The test protocol must address this before CEB can approve the protocol.

Comment 7:

D.1.11 states "When for any one reading, the pressure drop across the scrubber is outside the normal range of 0-3 inches of water..." The previous permit listed a range of 1-4 inches. If the pressure drop reading lower-range value is set at zero, the readings at zero will not show the scrubber is operating under negative pressure. Suggested language is "When for any one reading, the pressure drop across the scrubber is outside the normal range of 1-4 inches of water..."

Response to Comment 7:

IDEM concurs with the above comment. The pressure drop across the scrubber has been revised to a range of 1-4 inches. For a more detailed response, see "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

Comment 8:

Under D.1.12, it states, "The failed unit and associated dryers and oil processing tanks will be shut down as soon as practicable until the failed units have been repaired or replaced." None of the tanks in D.1 are described as dryers or oil processing tanks. Please insure the appropriate tanks are referenced.

Response to Comment 8:

In order to insure the scrubber is controlling emissions properly, Condition D.1.12 has been updated to include the Tank ID's. The permit has been changed as follows:

D.1.12 Scrubber Failure Detection [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

In the event that scrubber failure has been observed:

The failed unit and associated ~~dryers and oil processing tanks~~, **P1, P2, P3, P4, P5, P6, P7, P8, P9, P10, P11, P12, P13, P14, P15, SHT2, W8, D1, D2, D3, D4, D5, K1, K2, or/and K3**, will be shut down as soon as practicable until the failed units have been repaired or replaced. Operations may continue as soon as practicable if the event qualifies as an emergency and the Permittee satisfies the technology-based requirements of the emergency provisions of this permit (Section B - Emergency Provisions). Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

Comment 9:

Uncontrolled process emissions are defined in the TSD as VOC emissions being greater than 100 tpy and HAP emissions greater than 25 tpy. It is unclear what portion of the process emissions are

controlled by the scrubber. It is also unclear in the permit how certain tanks were determined to require a control and others were not. While the mass balance approach could be used as a means of verification, sending VOC and HAP emissions from all tanks to a scrubber will provide greater assurance of continuous compliance. All tanks that have the potential to emit VOC or HAPs should be vented to the scrubber.

Response to Comment 9:

See "IDEM, OAQ Response – Determination of SO₂, VOC, and HAPs Emissions" Section of this document for a detailed response of how source-wide emissions are to be determined.

Comment 10:

Railcar loading and unloading takes place on a railroad spur located next to their property. Why were emissions from the railcar loading and unloading associated with this source not included in the permit?

Response to Comment 10:

Source Determination:

IDEM, OAQ has made the following source determination:

Metalworking Lubricants receives product in a variety of ways including receiving product by rail transport. The rail loadout and truck loading of product occurs across the street from Metalworking Lubricants at a location they lease from Arrow Reload Systems Inc. The railcars are brought in and unloaded one at a time into an awaiting truck. This is done using the splash loading method.

IDEM, OAQ has examined whether the Metal Working Lubricants Company plant is part of the same major source with the Arrow Reload Systems Inc. These two plants are described as:

- (a) Metal Working Lubricants Company is located at 1509 South Senate Avenue, Indianapolis, Indiana 46225, Plant ID: 097-00139; and
- (b) One (1) railroad loadout, owned by Arrow Reload Systems Inc., located approximately at 1511 South Senate Avenue, Indianapolis, Indiana 46225, no Plant ID assigned.

In order to consider both plants as one (1) single "major source", pursuant to 326 IAC 2-7-1(22), all three of the following criteria must be met:

- (1) The plants must have common ownership or common control;
- (2) The plants must have the same two-digit Standard Industrial Classification (SIC) Code or one must serve as a support facility for the other; and
- (3) The plants must be located on the same, contiguous or adjacent properties.

Metal Working Lubricants Company is a distinct and separate corporate entity from Arrow Reload Systems Inc. The two companies share neither a common owner nor a common board of directors. Therefore, the plants are not under common ownership.

IDEM's Nonrule Policy Document Air-005 applies to the definition of "major source" in 326 IAC 2-7-1(22).

The guidance sets out two independent tests to determine if common control exists when there is no common ownership. The first test, the auxiliary activity test, determines whether one plant performs

an auxiliary activity which directly serves the purpose of the primary activity and whether the owner or operator of the primary activity has a major role in the day-to-day operations of the auxiliary activity. An auxiliary activity directly serves the purpose of a primary activity by supplying a necessary raw material to the primary activity or performing an integral part of the production process for the primary activity.

Day-to-day control of the auxiliary activity by the primary activity may be evidenced by several factors, including:

- is a majority of the output of the auxiliary activity provided to the primary activity?
- can the auxiliary activity contract to provide its products/services to a third-party without the consent of the primary activity?
- can the primary activity assume control of the auxiliary activity under certain circumstances?
- is the auxiliary activity required to complete periodic reports to the primary activity?

If one or a combination of these questions is answered affirmatively, common control may exist.

The railroad loadout was constructed by Arrow Reload System Inc. to facilitate the addition of liquids to the type of product that can be loaded and unloaded by Arrow Reload System Inc. The railroad spur that the loadout is located on is leased by Metal Working Lubricants from Arrow Reload System Inc. This railroad spur is located across the street from Metal Working Lubricants and is unavailable for use by any other person. Metal Working Lubricants operates the railroad loadout. All product unloaded from this location is sent only to Metal Working Lubricants. The Arrow Reload System Inc. loadout performs an auxiliary activity that directly serves Metal Working Lubricants. Therefore, the first common control test is met.

The second common control test is the but/for test. This test focuses on whether the auxiliary activity would exist absent the needs of the primary activity. If all or a majority of the output of the auxiliary activity is consumed by the primary activity the but/for test is satisfied. As stated above, all product unloaded is sent to Metal Working Lubricants. Therefore the second common control test is also met. The plants are under common control, meeting the first part of the major source definition.

The SIC Code Manual of 1987 outlines the procedure for determining the proper SIC Code for each type of business. More information about SIC Codes is available at http://www.osha.gov/pls/imis/sic_manual.html on the Internet. The Metal Working Lubricants Company plant has the two-digit SIC Code 29 for the Major Group Petroleum Refining and Related Industries. Arrow Reload Systems Inc., if a separate source, would have the two-digit SIC Code 40 for the Major Group Railroad Transportation. However, since the railroad loadout functions as part of the Metal Working Lubricants plant and serves no other plant or customer, it has the same SIC Code as Metal Working Lubricants. The two plants therefore share the same two-digit SIC Code.

A plant is a support facility to another plant if it dedicates 50% or more of its output to the other plant. In this case, 100% of the material unloaded from the railroad loadout is for the benefit of Metal Working Lubricants. Therefore the two plants do have a support facility relationship. Since the plants have the same two-digit SIC Code and have a support facility relationship, the plants meet the second part of the major source definition.

The two plants are located on properties separated by a right-of-way. The plants share a common property border on the right-of-way. The plants are therefore located on contiguous properties, meeting the third part of the major source definition. The plants meet all three parts of the major source definition. Therefore, IDEM, OAQ has determined that these two (2) plants will be considered one (1) major source, as defined by 326 IAC 2-7-1(22).

IDEM, OAQ has added Condition A.2 – Source Definition [326 IAC 2-7-1(22)] to the permit. With the addition of this condition, the remaining conditions have been renumbered. The permit has been

changed to include this emission unit as follows:

A.2 Source Definition [326 IAC 2-7-1(22)]

IDEM, OAQ has examined whether the Metal Working Lubricants Company plant is part of the same major source with the Arrow Reload Systems Inc. These two plants are described as:

- (a) Metal Working Lubricants Company is located at 1509 South Senate Avenue, Indianapolis, Indiana 46225, Plant ID: 097-00139; and
- (b) One (1) railroad loadout, owned by Arrow Reload Systems Inc., located approximately at 1511 South Senate Avenue, Indianapolis, Indiana 46225, no Plant ID assigned.

In order to consider both plants as one (1) single “major source”, pursuant to 326 IAC 2-7-1(22), all three of the following criteria must be met:

- (1) The plants must have common ownership or common control;
- (2) The plants must have the same two-digit Standard Industrial Classification (SIC) Code or one must serve as a support facility for the other; and
- (3) The plants must be located on the same, contiguous or adjacent properties.

Metal Working Lubricants Company is a distinct and separate corporate entity from Arrow Reload Systems Inc. The two companies share neither a common owner nor a common board of directors. Therefore, the plants are not under common ownership.

IDEM’s Nonrule Policy Document Air-005 applies to the definition of “major source” in 326 IAC 2-7-1(22).

The guidance sets out two independent tests to determine if common control exists when there is no common ownership. The first test, the auxiliary activity test, determines whether one plant performs an auxiliary activity which directly serves the purpose of the primary activity and whether the owner or operator of the primary activity has a major role in the day-to-day operations of the auxiliary activity. An auxiliary activity directly serves the purpose of a primary activity by supplying a necessary raw material to the primary activity or performing an integral part of the production process for the primary activity.

Day-to-day control of the auxiliary activity by the primary activity may be evidenced by several factors, including:

- is a majority of the output of the auxiliary activity provided to the primary activity?
- can the auxiliary activity contract to provide its products/services to a third-party without the consent of the primary activity?
- can the primary activity assume control of the auxiliary activity under certain circumstances?
- is the auxiliary activity required to complete periodic reports to the primary activity?

If one or a combination of these questions is answered affirmatively, common control may exist.

The railroad loadout was constructed by Arrow Reload System Inc. to facilitate the addition of liquids to the type of product that can be loaded and unloaded by Arrow Reload System Inc. The railroad spur that the loadout is located on is leased by Metal Working Lubricants from Arrow Reload System Inc. This railroad spur is located across the street from Metal Working Lubricants and is unavailable for use by any other person. Metal Working Lubricants operates

the railroad loadout. All product unloaded from this location is sent only to Metal Working Lubricants. The Arrow Reload System Inc. loadout performs an auxiliary activity that directly serves Metal Working Lubricants. Therefore, the first common control test is met.

The second common control test is the but/for test. This test focuses on whether the auxiliary activity would exist absent the needs of the primary activity. If all or a majority of the output of the auxiliary activity is consumed by the primary activity the but/for test is satisfied. As stated above, all product unloaded is sent to Metal Working Lubricants. Therefore the second common control test is also met. The plants are under common control, meeting the first part of the major source definition.

The SIC Code Manual of 1987 outlines the procedure for determining the proper SIC Code for each type of business. More information about SIC Codes is available at http://www.osha.gov/pls/imis/sic_manual.html on the Internet. The Metal Working Lubricants Company plant has the two-digit SIC Code 29 for the Major Group Petroleum Refining and Related Industries. Arrow Reload Systems Inc., if a separate source, would have the two-digit SIC Code 40 for the Major Group Railroad Transportation. However, since the railroad loadout functions as part of the Metal Working Lubricants plant and serves no other plant or customer, it has the same SIC Code as Metal Working Lubricants. The two plants therefore share the same two-digit SIC Code.

A plant is a support facility to another plant if it dedicates 50% or more of its output to the other plant. In this case, 100% of the material unloaded from the railroad loadout is for the benefit of Metal Working Lubricants. Therefore the two plants do have a support facility relationship. Since the plants have the same two-digit SIC Code and have a support facility relationship, the plants meet the second part of the major source definition.

The two plants are located on properties separated by a right-of-way. The plants share a common property border on the right-of-way. The plants are therefore located on contiguous properties, meeting the third part of the major source definition. The plants meet all three parts of the major source definition. Therefore, IDEM, OAQ has determined that these two (2) plants will be considered one (1) major source, as defined by 326 IAC 2-7-1(22).

A.21 Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]

A.34 Specifically Regulated Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]

A.45 Insignificant Activities [326 IAC 2-7-1(21)][326 IAC 2-8-3(c)(3)(I)]

(j) One (1) rail loading and unloading operation, constructed before 1996.

(k) One (1) truck loading and unloading operation, constructed before 1996

A.56 FESOP Applicability [326 IAC 2-8-2]

Loading and Unloading Emissions:

Loading losses occur as the organic vapors in "empty" tanks are displaced to the atmosphere by the liquid being loaded into the tanks. These vapors are a composite of vapors formed in the empty tank by evaporation of residual product from previous loads and vapors generated in the tank as the new product is being loaded.

Products received by Metalworking Lubricant Company are directed into holding tanks. The displaced and generated vapors displaced as part of this process are accounted for in the source wide VOC and HAP PTE equation since these emissions result from the organic constituent of the received product.

The recent loading history of a cargo carrier is just as important a factor in loading losses as the method of loading. If the carrier had previously contained a nonvolatile liquid such as fuel oil, or has just been cleaned, it will contain vapor-free air. If it had just been used to transport gasoline and has not been vented, the air in the carrier tank will contain volatile organic vapors that will be expelled during the loading operation along with newly generated vapors.

Metalworking Lubricant Company produces oil similar in composition to fuel oil. These products are loaded at ambient temperate into truck or railcars previously containing a similar nonvolatile liquid. EPA Tanks 4.0.9d was utilized to calculate the VOC emissions from loading product into tankers, and as a highly conservative approach, the product loaded was considered to be No. 2 Fuel Oil heated to a constant 72°F. This approach yielded VOC emissions of 34.57 pounds per year.

The emissions from the trucks are fugitive. Metalworking Lubricants is not one of the twenty-eight PSD source categories for which fugitives are counted.

Comment 11:

Under the Compliance Monitoring Requirement section, how will the source show that the tank vent lines are properly connected to route emissions to the scrubber? Would this be accomplished by continuously monitoring pressure drop on the vent lines?

Response to Comment 11:

Metalworking Lubricants Company is required to certify compliance with the requirements of the permit. This includes certifying that tanks required to vent to the scrubber are properly vented at all times.

Comment 12:

The City of Indianapolis, Department of Code Enforcement, Bureau of Environmental Services would like to be granted authority from IDEM to perform additional permit compliance inspections as an "authorized representative" under B.20 for this company.

Response to Comment 12:

See "IDEM, OAQ Response – Local Government as Authorized Representative" Section of this document for a detailed response.

Comments From Jennifer Andres and IDEM, OAQ Responses
--

On December 16, 2014, Jennifer Andres, on behalf of the Indiana Rail Road Company, submitted the following.

The following are comments to the Permit referenced above concerning Metalworking Lubricants Company ("MLC"), located at 1509 South Senate Avenues, Indianapolis, IN 46225 ("Facility"). These comments are being submitted on behalf of our client, the Indiana Rail Road Company. The public comment period for the Permit ends on December 17, 2014, and therefore this submission is timely filed.

Comment 1:

The Facility Operation Conditions of the Permit, as written, are not adequate to insure efficient operation of control equipment at the Facility and have the potential to allow excess emissions, as further described below.

- a. The operating requirements contained in Section D.1 of the permit are not sufficient to insure that the scrubber is operating properly and in compliance. Parameters such as pH, residence time, liquid-to-gas-ratio and chlorine content are important factors in the efficient operation of the scrubber and should be monitored to insure compliance. The failure to require monitoring of these parameters could result in air quality and odor issues and should be required to be monitored by MLC in the permit.
- b. The Emissions Unit Description contained in Section D.1 of the permit does not adequately describe why controls are not required for some of the tanks listed at the facility. Specifically, a few of the process tanks listed are controlled by the sodium bi-sulfite injection scrubber, while there are a number of process tanks that are vented directly to the atmosphere. Process tank contents, individual tank emissions and additional details should be provided in the permit to prove why controls are not required for some of the tanks. To the extent required, additional controls should be added to insure air quality concerns are adequately addressed.
- c. The pressure drop range described in the permit in Condition D.1.11 was revised from 1-4 inches of water to 0-3 inches of water without any explanation as to why this change was made. There are concerns with the effectiveness of use of the pressure drop if the minimum amount is 0 as there will be no way to tell if the equipment is not operating properly. The minimum amount of water should be above 0 inches to be able to determine whether the equipment is functioning properly.
- d. Recording total static pressure drop once per day may not be a sufficient frequency rate to monitor the scrubber if multiple tank batches are processed per day. Requiring the recording of the total static pressure drop once per batch would be a more appropriate frequency. In addition, consistent with Comment 1.c. above, if the value of the pressure drop range is lower to 0 inches of water the facility would not be able to determine if this was due to the scrubber being non-operational or otherwise operating abnormally. The pressure drop minimum value should be greater than 0.

Response to Comment 1:

The following is response to a:

Compliance with the combination of requirements to emission test, monitor the scrubber pressure drop and hypochlorite feed rate, and to install and operate CEMS will insure that the scrubber is operating properly. During any stack test, the scrubber must be operating under conditions of maximum air and water flows. These operating conditions, along with a successful compliance test demonstration, will be used to update the correct pressure drop range. If compliance testing reveals the scrubber to have operating issues, additional compliance determination parameters, such as pH, residence time, liquid-to-gas-ratio or chlorine content, can be added to the permit.

In response to b and c, see "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

The following is response to d:

Metalworking Lubricants processes the oil in batches. The onsite tanks receive and store the oil until a processing phase is completed. The product is then moved to the next available processing tank. A monitoring condition of once per batch is not intended to be representative of the entire process because multiple batches are occurring at any given time and at different

phases of processing. Conversely, monitoring the static pressure drop once per day will be more representative of the operating of the scrubber irrespective of the particular stage of any given tank. IDEM concurs with the comment to revise the normal range of operation for the scrubber. The permit has been changed as follows:

D.1.11 Parametric Monitoring for Scrubber [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

The Permittee shall record the total static pressure drop across the scrubbers used in conjunction with the tanks, at least once per day when the tanks are in operation when venting to the atmosphere. When for any one reading, the pressure drop across the scrubber is outside the normal range of ~~1-4 0-3~~ inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

Comment 2:

The facility's potential to emit was not properly considered in the permit.

- a. The TSD and Appendix A - Emission Calculations do not include potential emissions calculations for the process tank and drying operations. The process tank and drying operations potential emissions should be provided to indicate the levels of hydrogen sulfide, sulfur oxides, volatile organic compounds, hydrogen chloride and any other hazardous air pollutants that may be present in the process tank waste processing operation.
- b. The TSD states that State Rule 326 IAC 6.5 is not applicable to this facility because the particulate matter potential to emit is less than 100 tpy and actual emissions are less than 10 tons/year. However, actual emissions and the potential emissions are not included in this document to justify that this rule is not applicable to the source. Information regarding the actual particulate matter emissions should be provided in the TSD to support this claim.
- c. The TSD states that, in regards to 326 IAC 7 applicability, none of the emission units at this facility have the potential to emit 25 tons per year or 10 pounds per hour of sulfur dioxide, therefore, 326 IAC 7 does not apply to this source. The TSD and supporting permit documents do not include potential to emit calculations for the process tanks. Therefore, the basis for the exclusion of the process tanks from the regulation is not established. Please provide potential to emit calculations demonstrating that each process tank emits less than 25 tons per year or 10 pounds per hour of sulfur dioxide.
- d. The permit documents do not include potential to emit calculations for the process tanks. Therefore, the basis for the exclusion from the regulation is not established. Please provide potential to emit calculations demonstrating that each process tank emits less than 25 tons of VOC per year.

Failure to properly consider potential to emit could result in inadequate controls and has to potential to have a negative impact on air quality and the public health and should be analyzed in the permit.

Response to Comment 2:

Appendix B to this document, Addendum to the Technical Support Document, contains a detailed analysis of the sampled lab results submitted by Metalworking Lubricants Company.

The majority of VOC emissions are expected to occur from the heated production and storage tanks

located at the source.

To calculate the potential VOC emissions from a single tank, tanks were grouped according to the number of turnovers. The potential emissions of VOC were then calculated for the tank with the largest capacity within each of the groups, representing the maximum possible tank throughput, and therefore, maximum potential VOC emissions. The potential emissions for the representative tanks, prior to consideration of VOC reduction at the scrubber, resulted in maximum potential VOC emissions of 15.94 tons per year. Therefore, the requirements 326 IAC 8-1-6 (BACT) are not applicable to any of the tanks at the source. Appendix B to this document, Addendum to the Technical Support Document, contains a detailed analysis supporting this calculation.

Any emission unit that combusts a fossil fuel is potentially regulated by Article 7 if its potential to emit SO₂ is greater than 25 tons per year or 10 pounds per hour. The combustion units at this source combust either natural gas or diesel and have the potential to emit less than these thresholds, therefore, 326 IAC 7 does not apply to this source.

In lieu of actual particulate matter, the potential particulate emissions were evaluated against the applicability thresholds.

Comment 3:

The TSD and permit do not have sufficient information demonstrating how emissions from the process tank and drying operations of sulfur oxides, hydrogen sulfide and hydrogen chloride are controlled, in order to comply with 326 IAC 2-8, 326 IAC 2-2 and 326 IAC 2-4.1. Hydrogen sulfide and sulfur oxides are believed to contribute significantly to odor nuisance, which has been cited as an issue at MLC. Therefore, an illustration of how the hydrogen sulfide and sulfur oxides emissions are controlled by the scrubber, including the control efficiency, should be included in the permit and TSD to insure public health and air quality are adequately protected.

Response to Comment 3:

See "IDEM, OAQ Response – Scrubber Operation and Monitoring" Section of this document for a detailed response.

Comment 4:

The permit does not adequately analyze federal rule applicability to the operations at the facility. Specifically, while the Federal Rule Applicability section of the TSD does include the applicability review for a few potentially applicable federal rules, there are several others which should be evaluated for applicability.

- a. 40 CFR 63, Subpart DD
- b. 40 CFR 63, Subpart H
- c. 40 CFR 63, Subpart EEE
- d. 40 CFR 63, Subpart FFFF
- e. 40 CFR 63, Subpart BBBB
- f. 40 CFR 60, Subpart CCCC
- g. 40 CFR 61, Subpart V

Based on the waste stream the facility receives and processes, a more complete analysis of federal rule applicability should be performed and, to the extent applicable, additional operational or emission

controls should be added to the permit.

Response to Comment 4:

See "IDEM, OAQ Response – Federal Rule Applicability" Section of this document for a detailed response.

Comments From Representatives Dan Forestal and Justin Moed and IDEM, OAQ Responses

On December 17, 2014, Representative Dan Forestal and Justin Moed, submitted the following comment:

Comment 1:

We are writing to you today to address our concern regarding Permit Number F097-32513-00139. We have had several constituents contact us regarding the foul chemicals off gassed in their neighborhoods by Metal Working Lubricants. The chemical off gassing interferes with the residents' ability to enjoy their lives.

The contaminants put into the air by Metal Working Lubricants cause runs by the Indianapolis Fire Department, buildings to be evacuated, and generally disrupt life for anyone who lives within the area where the contaminates are experienced.

We stand with our neighborhoods and constituents across Indianapolis. We respectfully request that Metal Working Lubricants permit not be issued; until Metal Working Lubricants becomes the good neighbor they are capable of being. Metal Working Lubricants has within its power the ability to manage these contaminants, but they choose not to do so. We encourage Metal Working Lubricants to become good neighbors and resolve the issue of the chemicals they emit, negatively impacting Indianapolis neighborhoods.

Response to Comment 1:

See "IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic" Section of this document for a detailed response.

Comments From Kevin Marin and IDEM, OAQ Responses
--

On December 1, 2014, Kevin Marin, submitted the following comment:

Comment 1:

I work and am on the near South Side often. I cannot stand the "metals / lubricants" smell that often passes by. This is not acceptable in our neighborhood from a residential, business, visitor stand point. I am involved with Colts games, I am on Downtown Indy's Marketing Board, and I am the chairperson for the Stadium Village Business Associations Develop Committee, and I own The UPS Store at 133 W. Market St. We cannot stand and we are embarrassed of that smell!

Response to Comment 1:

See "IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic" Section of this document for a detailed response.

Comments From Linda and Jim Simmons and IDEM, OAQ Responses
--

On December 12, 2014, Linda and Jim Simmons, on behalf of the Garfield Park Neighbors Association, submitted the following comment:

Comment 1:

I'm writing this note on behalf of our 1,119 household neighborhood association but it is also a personal plea. First, our neighbors are worried and angry that they cannot determine the content of the contaminants that engulf their homes on a regular, sometimes daily basis. They demand answers and will become involved in any effort that they sense will lead to resolution.

For ourselves, my wife and I grew up in the Garfield Park neighborhood, moved away for thirty-five years, and moved back several years ago upon retirement, buying a home on Garfield Drive, across the street from the park. Early on one of the first mornings after move-in I went to the front porch for the morning paper and was stunned by the obvious presence of some form of air contaminant evidently emanating from somewhere west of the park. It was an otherwise beautiful, crisp dawn making the issue even more obvious. I was initially concerned that it was a gas leak and phoned Citizen's Energy only to find that there had been other calls and that no leak had been found.

Over time I had conversations with other agencies and eventually was advised of a working group that met monthly to discuss this same issue. Because I am familiar with oxidation and scrubber technologies I was very interested in the opinions and progress of the group. What I discovered was a group of earnest, caring environmentalists who were frustrated with both the history of the alleged offender and the future prospects for corrective action. This, along with the following statement, summarizes why we take a strong position on this matter.

Ms. Alexander, no one is more precious to my wife and me than our nine grandchildren who live in San Francisco, Denver, New York and the north side of Indianapolis. Initially after move-in all our grandchildren came to visit together during the summer months. Our daughters immediately began questioning the content of the fumes they detected and were concerned when I had no answers. Accordingly, they now come for visits at other times of the year as the effect of the contaminants was exacerbated by the hot, humid summer weather. And even then the children are not allowed outdoors whenever the contaminants are detected. Because their spring and fall breaks occur at varying times we're no longer able to enjoy all of them here with us at the same time. We worry about the long-term effect of what we're breathing but also are disheartened that we cannot have our children and grandchildren with us as a group. It's for the foregoing reasons that we strongly support a hearing on this issue.

Response to Comment 1:

See "IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic" Section of this document for a detailed response.

Comments From John Bragg and IDEM, OAQ Responses

On December 4, 2014, John Bragg, submitted the following comment:

Comment 1:

Thanks for putting on the public hearing and meeting this evening, I didn't speak, but wanted to put my comments in writing.

My name is John Bragg and I have lived in the neighborhood for 7 years and I also own a business in the neighborhood. I have dealt with the air contaminants and accompanying odor the entire time I

have been here. It has had an adverse effect on the quality of life in the neighborhood and I believe has had a negative effect on future developments in the area. I am the immediate past president of the Stadium Village Business Association and we have worked hard to try to create opportunities for economic development in this area to help build up the neighborhoods. We have wanted to see new businesses move into the neighborhood and have been anxious to see new multi-family housing being built in the area. We have worked hard to create a business-friendly environment and an area that attracts other businesses and residents alike. The stench that comes from Metal Working Lubricants has been nothing short of a public nuisance. It has had a negative effect on those living in the area and had a negative impact on those visitors in the area that have come to frequent the restaurants and other businesses in the neighborhood. This stench is keeping this neighborhood from seeing its true potential because of the adverse effects it's having on the air quality. Metal Working Lubricants needs to be held accountable for its actions. It knowingly is creating this problem and doesn't seem to care about the negative effects it's having on everyone in the surrounding area. IDEM needs to create the strongest air quality permit that it can and make sure that it enforces all of the requirements and statutes that goes along with it. It also needs to fine and penalize them for any and all violations that it finds. I feel that these fines should be retroactive to the time and dates that they have been violating their existing permits. They need to be fined to the highest extent of the law. They have been running this business for decades with no regard to the citizens of the surrounding neighborhoods. They have run a business in a way that shows a lack of conscience, morals or ethical concern. Frankly, we want the stench gone. If they don't abide by the rules of the permit and eliminate the stench that permeates the area, then they need to be gone.

Response to Comment 2:

See "IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic" Section of this document for a detailed response.

Comments From Dr. Robert Kainz and IDEM, OAQ Responses

On February 4, 2014, Dr. Robert Kainz, submitted the following comment:

Comment 1:

Thank you for your work on Metalworking Lubricants air permit. The entire IDEM staff did a great job with such an event. You handled it very well. We wish to take the opportunity to make some specific comments on the permit.

1. We are asked to measure what comes in the plant and what goes out of the plant. This is currently being done. We will submit statements showing our loads but not our customers. This will be submitted for a period of 90 days. The tests will be run and data will be submitted to IDEM. It is our intention to show over the 90 day time period that we have data which proves we are not a FESOP but a MSOP. IDEM will base their decision on the data. The number of truckloads used will be approximately 500 and the loads are not expected to go over 800 trucks without a permit notification.
2. The Indianapolis property includes three different distinct plants in that area. For a period of 90 days we will track material that will enter the plant and emissions from the plant. SO₂, VOCs, and HAPs will be measured.
3. Records are kept on all plants at the site. These records include the stack, scrubber and equipment.
4. In the scrubber one of several materials is used in the scrubber. The choice will be the determination of the facility operator.

5. In the plant S is of concern. The facility uses H₂SO₄, however S is not present.
6. We will provide IDEM records.
7. Metalworking performs testing using EPA and ASTM procedures.

Additional comments will be forthcoming to improve the permit process. Thank you for your professional work.

Response to Comment 1:

The source must submit all reports, records, and data, required by the permit. Notwithstanding statements made as part of this comment, if the information is required by the permit, then the source has a legal obligation to provide complete and timely submittals to IDEM,

IDEM looks forward to working with Metalworking Lubricants on future permitting actions and assisting the source in complying with all applicable requirements.

No changes were made as a result of this comment.

IDEM, OAQ Response – Environmental justice, quality of life and protecting human health
--

The Office of Air Quality issues air pollution control permits to facilities that emit regulated levels of pollutants to the atmosphere. Permits require sources to comply with all health-based and technology-based standards established by the U.S. EPA. The federal Clean Air Act requires the U.S. EPA to set National Ambient Air Quality Standards (NAAQS) for the six criteria pollutants: particulate matter, ozone, carbon monoxide, nitrogen oxides, sulfur dioxide and lead.

Exposure to high concentrations of any of the criteria pollutants is associated with numerous effects on human health, including increased respiratory symptoms, hospitalization for heart or lung diseases, and even premature death. Detailed information about the health effects of each of the criteria pollutants is available online at <http://www.epa.gov/air/urbanair>. Additional information concerning the criteria pollutants is available on U.S. EPA's website at <http://www.epa.gov/air/airpollutants.html>.

Each of the NAAQS are set at concentration levels that protect human health, including the health of the most sensitive persons in the population, such as children, the elderly and those with preexisting medical conditions. The NAAQS are often referred to as the federal health standards for outdoor air. The complete table of the NAAQS can be found on the Internet at <http://www.epa.gov/air/criteria.html>. U.S. EPA and IDEM have determined that Blackford County currently meets all the NAAQS.

IDEM conducts sampling of the ambient air at monitoring stations located throughout Indiana. This air monitoring is conducted to measure air quality and determine whether certain of the NAAQS are being met. Information about Indiana's air monitoring system and monitoring results is available online at <http://www.in.gov/idem/4116.htm>. Additionally, information about current and expected air pollution levels is available on IDEM's SmogWatch site at <http://www.in.gov/apps/idem/smog/>.

Toxic air pollutants, also known as hazardous air pollutants (HAPs), are those pollutants that are known or suspected to cause cancer or other serious health effects, such as reproductive problems or birth defects, or adverse environmental effects. Examples of HAPs include benzene, which is found in gasoline; perchlorethylene, which is emitted from some dry cleaning facilities; and methylene chloride, which is used as a solvent and paint stripper. More information about HAPs can be found at the U.S. EPA's website at <http://www.epa.gov/ttn/atw/allabout.html>.

Permits being issued must be in compliance with applicable thresholds used to insure compliance with the NAAQS stated above. Compliance with this permit will insure that the operations at Metalworking Lubricants will not endanger compliance with the NAAQS and demonstrate compliance with all applicable Federal and State air pollution regulations.

No changes were made as a result of these comments.

IDEM, OAQ Response – Odor, Change in Property Zoning, Quality of Life and Truck Traffic
--

The statutes cited by the commenters are from the statutory laws of the State of Indiana as codified in the Indiana Code. These statutory laws, and others, passed by the Indiana Legislature, give the Indiana Environmental Rules Board (IERB) the authority to pass rules. The Indiana Code chapter cited by the commenters, Indiana Code (IC) 13-17-1, sets out the general intent and purposes of Indiana's air pollution control laws. In the same article, IC 13-17-3-4 gives the IERB the power to adopt rules that are consistent with the general intent and purposes declared in IC 13-17-1. In addition, the, IC 13-17-3-4 states that the IERB may adopt rules:

...only after considering the:(1) environmental significance of; (2) federal requirements for federally delegated or approved programs concerning; and (3) need for opportunity for public participation on; the permits or permit modifications.

These Indiana statutes can be found at <https://iga.in.gov/legislative/laws/2014/ic/titles/013/> on the Internet.

IDEM, OAQ issues permits pursuant to the rules passed by the IERB. These rules set out not only the "practical and economically feasible methods" for controlling contaminants that are called for in IC 13-17-1-1 but also set out the type and level of air pollutant emissions that make such methods applicable to a plant. IDEM, OAQ does not have the authority in an air pollution control permit to regulate any odor without Indiana air pollution control rules that set out exactly the type and level of odor emissions that will be controlled as well as the practical and economically feasible methods for controlling those odors. The general statements in the cited Indiana Code sections are not specific enough to allow IDEM to incorporate odor regulation in an air permit.

As the commenters noted, odor rules have not been passed by the IERB. Odors, unlike most air contaminants, are not measurable by any commonly accepted scientific instrument or method. This makes odor control extremely difficult to address in air pollution control regulations, since there is no objective, measurable level of odor to apply control measures against.

IDEM, OAQ air permits for Title V sources must comply with content requirements found under 326 IAC 2-7-5, which requires that permits include emission limitations and standards in compliance with all applicable requirements. The permit must "specify and reference the origin of and authority for each term or condition" within the permit. 326 IAC 2-7-5(1)(A)(i). 326 IAC 2-7-5(3) also requires that the permit include monitoring, related record keeping, and reporting requirements to assure proper evaluation of continuous compliance with the applicable requirements.

None of the federal requirements listed as "applicable requirements" in 326 IAC 2-7-1(6) authorize IDEM, OAQ to regulate odors through air permits. In addition to applicable requirements, "any additional requirement that is enforceable by the state" can be specified as the origin or authority of a permit's term or condition. There is, as stated above, no Indiana air pollution rule controlling odor emissions that can be cited to satisfy the origin and authority requirements under 326 IAC 2-7-5(1)(A)(i). Therefore there is no origin or authority, federal or state, which can be cited that gives IDEM, OAQ the authority to issue an air permit with terms or conditions to control odors.

Any person, including the commenters, may petition the IERB to pass rules to regulate odor. The Indiana statute that deals with citizen petitions for rulemaking is IC 13-14-8-5. It can be found at

<https://iga.in.gov/legislative/laws/2014/ic/titles/013/> on the Internet. It states that any person may present written proposals for the adoption, amendment, or repeal of a rule by the IERB. A proposal presented under this section must be supported by a statement of reasons and accompanied by a petition signed by at least two hundred (200) persons. If the IERB finds that the proposal is not plainly devoid of merit and does not deal with a subject on which an IERB hearing was held within the previous six months of the submission of the proposal, then the IERB will give notice and hold a hearing on the proposal. For additional information on how to get involved in Indiana's Environmental Rulemaking Process, please go to www.idem.IN.gov/4087.htm on IDEM's website.

Unusual odors can be an indicator that a plant is operating out of compliance with the requirements of its air permit. Any citizen detecting an unusual odor from any permitted plant should contact IDEM, OAQ. The supervisor for the air inspector for this source is Janusz Johnson. Mr. Johnson may be reached at 317-233-1134 or toll-free at 800-451-6027 ext. 3-1134 or by Fax at 317-233-6865. Citizens may also use IDEM's Compliant Clearinghouse to file a complaint with IDEM by:

1. Submitting a complaint online at IDEM's website at <http://www.in.gov/ideM/5274.htm>;
2. Calling the Complaint Coordinator toll free at (800) 451-6027 ext.24464; or
3. Printing, completing, and mailing a paper-based Complaint Submission Form. The IDEM Complaint form is available on IDEM's website at <http://www.in.gov/ideM/5157.htm#agency>.

Citizens are not required to provide any personal information (such as name, phone number) when filing a complaint. However, providing personal information enables IDEM to contact citizens for further information and keep them updated on the progress of the complaint investigation. Any information submitted to IDEM can become public record, subject to public records laws.

No change has been made to the permit as part of this response.

IDEM, OAQ Response – Tank Locations

The permit contains numerous tanks and includes details relevant to determinations of applicable requirements. These details include: size, year of installation, venting configurations, material stored, and processes conducted within each tank. The source would be required to submit a permit revision in order to modify these conditions in any significant way.

No change has been made to the permit as part of this response.

IDEM, OAQ Response – Federal Rule Applicability

40 CFR 60 Subpart Kb

This source is not subject to the requirements of the New Source Performance Standard for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984, 40 CFR 60.110b, Subpart Kb. Metalworking Lubricant Company receives oil similar in composition to residual oil and produces oil similar to fuel oil. EPA Tanks 4.0.9d and the limited temperature in the permit were utilized to calculate the vapor pressure of these oils. At the maximum temperature allowed in the permit, 210°F (99°C), the vapor pressure of the materials Metalworking Lubricants Company uses is 2.23 kPa for fuel oil and 0.0206 kPa for residual oil. Even at worst case, the vapor pressure of the oil-based lubricants remains below the applicability trigger for the requirements of this subpart; therefore 40 CFR 60, Subpart Kb does not apply.

40 CFR 60, Subpart CCCC

This source is not subject to the requirements of the New Source Performance Standard for Commercial and Industrial Solid Waste Incineration Units, 40 CFR 60.2000, Subpart CCCC. The source does not include a commercial and/or industrial solid waste incinerator on site, therefore 40 CFR 60, Subpart CCCC does not apply.

40 CFR 61, Subpart V

This source is not subject to the requirements of the National Emission Standard for Equipment Leaks (Fugitive Emission Sources), 40 CFR 61.240, and Subpart V. The source has stated that it does not include any pumps, compressors, pressure relief devices, sampling connection systems, open-ended valves or lines, valves, connectors, surge control vessels, or bottoms receivers that contain 10% by weight of a VHAP, therefore 40 CFR 61, Subpart V does not apply.

40 CFR 63, Subpart H

This source is not subject to the requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Organic Hazardous Air Pollutants for Equipment Leaks, 40 CFR 63.160, Subpart H. Subpart H is only applicable to sources that are also subject to a 40 CFR 63 subpart that references Subpart H. Metalworking Lubricants is not subject to any 40 CFR 63 subparts referencing 40 CFR 63 Subpart H, therefore Subpart H is not applicable.

40 CFR 63, Subpart DD

This source is not subject to the requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) from Off-Site Waste and Recovery Operations, Subpart DD. Metal Working Lubricant has taken limits to qualify as an area source of HAPs; therefore 40 CFR 63, Subpart DD does not apply.

40 CFR 63, Subpart EEE

This source is not subject to the requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) from Hazardous Waste Combustors, Subpart EEE. The source does not include a hazardous waste combustor onsite; therefore 40 CFR 63, Subpart EEE does not apply.

40 CFR 63, Subpart FFFF

This source is not subject to the requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs): Miscellaneous Organic Chemical Manufacturing, Subpart FFFF. Metal Working Lubricant has taken limits to qualify as an area source of HAPs; therefore, 40 CFR 63, Subpart FFFF does not apply.

40 CFR 63, Subpart BBBBBBB

This source is not subject to the requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Area Sources: Chemical Preparations Industry, Subpart BBBBBBB. Metal Working Lubricant does not fit into the definition of a chemical preparation facility. The source's SIC is 2992 which does not correspond with NAICS code 325998; therefore, 40 CFR 63, Subpart BBBBBBB would not apply.

40 CFR 63 Subpart VVVVVV

This source is not subject to the requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAPs) for Chemical Manufacturing Area Sources, Subpart VVVVVV. The source has stated that they do not operate any chemical manufacturing processing units (CMPU). Rather, they are an offsite waste and recovery source. Additionally, based on the information provided by the source, none of the offsite waste streams received contains HAPs listed in 40 CFR 63, Subpart VVVVVV - Table 1. Therefore 40 CFR 63, Subpart VVVVVV does not apply. IDEM, OAQ will revisit this determination as new data becomes available.

No change has been made to the permit as part of this response.

IDEM, OAQ Response – Determination of SO₂, VOC, and HAPs Emissions

Based on the comments received, the major concerns involved emissions of SO₂, VOC, and HAPs. Based on the information provided from Metal Working Lubricants, the draft permit requires the source to restrict its emissions to the FESOP levels. The source will be limited to emitting less than 100 tons per year of SO₂, and VOC, each. HAPs emissions will be limited to less than 10 tons per year for any single HAP and 25 tons per year for all HAPs combined.

In order to ensure compliance with the limits outlined in the permit; testing, sampling, mass balance equations, and CEMS requirements have been added. Taken together, these requirements are structured to ensure that Metal Working Lubricants remains in compliance with the permit.

Metal Working Lubricants is required to sample each shipment of waste product received for the sulfur, VOC and HAPs content. The source will also be required to keep records of the sulfur, VOC, and HAPs content of all additives used in the processing of the waste products. This sampling and recordkeeping is the basis for quantifying source-wide emissions. Additionally, Metalworking Lubricants Company is required to conduct testing to determine the VOC and SO₂ reduction efficiency of the scrubber and equip the scrubber outlet with continuous emissions monitoring systems (CEMS) for SO₂ and VOC. These systems will provide an accurate accounting of the emissions from the scrubber system and allow for the calculation of the reductions based on the documented reduction efficiency of the scrubber. For Metal Working Lubricants to adjust reported emissions they will be required to perform additional sampling for the sulfur, VOC and HAPs content of all final products prior to shipment and quantify reductions at the scrubber.

To take credit for HAP emissions reductions achieved at the scrubber, Metalworking Lubricants Company is required to treat all VOC input and output quantities as a single HAP.

To ensure the CEMS and scrubbers are operating properly, testing is required. The source must perform emission testing for VOC, SO₂ and HAP within 180 days after the issuance date of this permit with subsequent testing required every 2.5 years from the date of the most recent, valid compliance demonstration. Additionally, the CEMS must undergo regular accuracy testing to insure that the system continues to correctly quantify the emissions. This testing, coupled with the equations in the permit, insures that the testing is conducted during the worst-case product scenario. If not, the SO₂, VOC and HAP emissions calculated by the equations will result in a more conservative (increased) representation of emissions.

IDEM, OAQ agrees that there was an error with the SO₂ and VOC equation. Further investigation revealed that, although it correctly calculated the fugitive emissions from Metal Working Lubricants, there was an error in the scrubber control credit. To properly calculate the control credit for the source, the SO₂/VOC emissions as measured by the CEM must be subtracted from the existing control credit. This new value provides the captured SO₂ or VOC emissions, which along with the pollutants found in the product, can be subtracted from the total SO₂ and VOC found in the additives and waste oils received. Below are the changes to the permit.

D.1.7 SO₂ and VOC Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3]

(a) ***

$$SO_2 = \left[\left(\sum_{i=1}^N SULFUR_{RECEIVED(i)} + \sum_{i=1}^N SULFUR_{ADDITIVES(i)} \right) \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} - \left(\left\{ SO_2_{EMITTED} / \left(1 - \frac{CE_{SO_2}}{100} \right) \right\} - SO_2_{EMITTED} \right) - \left\{ \sum_{i=1}^N SULFUR_{SHIPPED(i)} \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} \right\} \right] \div 2,000 \frac{\text{lbs}}{\text{ton}}$$

(b) ***

$$VOC = \left[\left(\sum_{i=1}^N VOC_{RECEIVED(i)} + \sum_{i=1}^N VOC_{ADDITIVES(i)} \right) - \left(\left\{ VOC_{EMITTED} / \left(1 - \frac{CE_{SO_2}}{100} \right) \right\} - VOC_{EMITTED} \right) - \left\{ \sum_{i=1}^N VOC_{SHIPPED(i)} \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} \right\} \right] \div 2,000 \frac{\text{lbs}}{\text{ton}}$$

D.1.8 Total HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]

(b) ***

$$VOC = \left[\left(\sum_{i=1}^N VOC_{RECEIVED(i)} + \sum_{i=1}^N VOC_{ADDITIVES(i)} \right) - \left(\left\{ VOC_{EMITTED} / \left(1 - \frac{CE_{SO_2}}{100} \right) \right\} - VOC_{EMITTED} \right) - \left\{ \sum_{i=1}^N VOC_{SHIPPED(i)} \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} \right\} \right] \div 2,000 \frac{\text{lbs}}{\text{ton}}$$

IDEM, OAQ Response – Scrubber Operation and Monitoring

During the public meeting, the scrubber design was raised as a concern. At that time and based on the information IDEM, OAQ had, it was believed that Metal Working Lubricants was employing a sodium bi-sulfite scrubber system. After additional information was received and researched, it was discovered that Metal Working Lubricants was using hypochlorite as the reagent instead of sodium bi-sulfite injection. Hypochlorite injection is a better option for the type of process at the source and the HAPs that need to be controlled.

The hypochlorite scrubber located at the source is used to control the emissions of VOC, HAPs and SO₂. With the tanks vented to the scrubber, there will be a reduction in all three (3) of these pollutants. The permit includes provisions for monitoring; testing and record keeping to insure that Metalworking Lubricants is operating the scrubber properly.

Conditions D.1.3, D.1.11 and D.1.12 were added to the permit as a consequence of a consent agreement between the City of Indianapolis and Metal Working Lubricants. The language has been modified to clarify what tanks are covered by this consent agreement and are required to be routed to

the scrubber for control. IDEM concurs with comments to alter the normal range of operation for the scrubber. The permit has been changed as follow:

A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]

- ***
- (c) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (d) Heated Water tanks, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (e) Heated Product tanks, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (f) Heated Product tanks, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (g) One (1) **Hypochlorite Injection**~~Sodium Bi-sulfite~~ Scrubber, constructed in 1980, exhausting to stack S-01.

SECTION D.1

FACILITY OPERATION CONDITIONS

- ***
- (c) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (d) Heated Water tanks, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (e) Heated Product tanks, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (f) Heated Product tanks, with emissions controlled by the **Hypochlorite**~~Sodium Bi-sulfite~~ Injection Scrubber.
- ***
- (g) One (1) **Hypochlorite Injection**~~Sodium Bi-sulfite~~ Scrubber, constructed in 1980, exhausting to stack S-01.
- ***

D.1.1 FESOP, PSD, Emission Offset ,and HAPs Minor Limits [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]

- ***
- (a) VOC, HAPs and SO₂ emissions from the following tanks shall be controlled by the **Hypochlorite Injection**~~Sodium Bi-sulfite~~ Scrubber.
- ***

- (b) The temperature of each tank routed to the **Hypochlorite Injection Sodium Bi-sulfite Scrubber** shall not exceed 210°F (99°C).

D.1.11 Parametric Monitoring for Scrubber [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

The Permittee shall record the total static pressure drop across the scrubbers used in conjunction with the tanks, at least once per day when the tanks are in operation when venting to the atmosphere. When for any one reading, the pressure drop across the scrubber is outside the normal range of 1-4 0-3 inches of water or a range established during the latest stack test, the Permittee shall take reasonable response steps in accordance with Section C- Response to Excursions or Exceedances. A pressure reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps in accordance with Section C - Response to Excursions or Exceedances, shall be considered a deviation from this permit.

D.1.13 Tank Temperature

- (a) A continuous monitoring system shall be calibrated, maintained, and operated on the heated tanks routed to the **hypochlorite injection scrubber Sodium Bi-sulfite Scrubber** for measuring operating temperature. For the purpose of this condition, continuous means no less often than once per fifteen (15) minutes. The output of this system shall be recorded as 3-hour average. The Permittee shall operate the tanks below the range outlined in Condition D.1.1(b).

D.1.14 Parametric Monitoring - **Hypochlorite Sodium Bi-sulfite Injection**

The Permittee shall record the **hypochlorite sodium bi-sulfite** feed rate into the scrubber at least once per day when the tanks are in operation. When, for any one reading, the **hypochlorite sodium bi-sulfite** feed rate into the scrubber is outside the normal range, the Permittee shall take a reasonable response. The normal range for this unit is a feed rate between 0.053 and 0.28 ft³/hr unless a different upper-bound or lower-bound value for this range is determined during the latest stack test. Section C - Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. A reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

D.1.16 Record Keeping Requirements [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]

- (e) To document the compliance status with Condition D.1.14, the Permittee shall maintain daily records of the **hypochlorite** feed rate into the **sodium bi-sulfite** scrubber. The Permittee shall include in its daily record when the **hypochlorite sodium bi-sulfite** feed rate is not taken and the reason for the lack of **hypochlorite sodium bi-sulfite** feed rate data (e.g. the process did not operate that day).

IDEM, OAQ Response – Local Government as Authorized Representative

Entering into a formal agreement, to delegate IDEM's authority, with the City of Indianapolis Department of Code Enforcement and/or the Marion County Public Health Department is beyond the scope of this permitting action. Any requests related to delegation of agency authority should be directed to IDEM's Commissioner.

No change has been made to the permit as part of this response.

IDEM Contact

- (a) Questions regarding this proposed Federally Enforceable State Operating Permit Renewal can be directed to Julie Alexander at the Indiana Department Environmental Management, Office of Air Quality, Permits Branch, 100 North Senate Avenue, MC 61-53 IGCN 1003, Indianapolis, Indiana 46204-2251 or by telephone at (317) 233-1782 or toll free at 1-800-451-6027 extension 3-1782.
- (b) A copy of the permit is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>
- (c) For additional information about air permits and how the public and interested parties can participate, refer to the IDEM Permit Guide on the Internet at: <http://www.in.gov/idem/5881.htm>; and the Citizens' Guide to IDEM on the Internet at: <http://www.in.gov/idem/6900.htm>.

Appendix A
Testimony During the Public Hearing
Metalworking Lubricants Company
F097-32513-0013

This page intentionally left blank.

BEFORE THE INDIANA DEPARTMENT OF
ENVIRONMENTAL MANAGEMENT

PUBLIC HEARING REGARDING
PERMIT APPLICATION NO. 0973251300193
METALWORKING LUBRICANTS

ORIGINAL

PROCEEDINGS

in the above-captioned matter, before Hearing
Officer Doug Wagner, taken before me, Lindy L.
Meyer, Jr., a Notary Public in and for the State
of Indiana, County of Shelby, at Emmerich Manual
High School, Mini Auditorium, 2405 South Madison
Avenue, Indianapolis, Indiana, on Monday,
February 16, 2015 at 7:10 o'clock p.m.

William F. Daniels, RPR/CP CM d/b/a
ACCURATE REPORTING OF INDIANA
12922 Brighton Avenue
Carmel, Indiana 46032
(317) 848-0088

1 APPEARANCES:

2 ON BEHALF OF IDEM:

3 Doug Wagner, Hearing Officer
4 Matthew W. Stuckey
5 Julie Alexander
6 Jenny Acker
7 Patty Pear

8 SPEAKERS PRESENT:

9 Bill Beranek
10 Gene Parsley
11 David Powell
12 Judith Essex
13 James Simmons
14 Crystal Bridgewater
15 Tom Dale
16 Tom Beck
17 Allyson Roselee
18 James Brightwell
19 Abraham Olson
20 Lisa Laflin
21 Jeff Veldhof
22 Rep. Dan Forestal
23 Rep. Justin Moed
Darrell Unsworth
David Buchanan
Richard Pardue
Christine Jack

7:10 o'clock p.m.
February 16, 2015

THE HEARING OFFICER: Hi. I'm Doug Wagner from the Indiana Department of Environmental Management. We're now going to start.

AUDIENCE MEMBER: We can't hear you.

MR. STUCKEY: Well, if everybody would sit.

DR. BERANEK: We're going to begin the hearing.

THE HEARING OFFICER: Can you hear me now?

AUDIENCE MEMBER: Yes.

MR. STUCKEY: Yeah, you've got to get close.

THE HEARING OFFICER: Thank you. I'm Doug Wagner from the Indiana Department of Environmental Management. We're now going to start the public hearing for Metalworking Lubricants, Permit Application No. 0973251300193.

During the public hearing portion, as I explained at the beginning of the public meeting,

1 we won't be making any responses to the comments
2 we get. This is an opportunity for folks to make
3 a comment, ask a question on the record. We
4 have -- all of these comments or questions will
5 be taken down by our court reporter, and he'll
6 prepare a written transcript.

7 We will use that in creating a final
8 document, where we set out all of the written
9 comments we receive, and so it's not only these
10 comments we get during this public hearing, it's
11 going to be any comment we get in writing, either
12 from an -- by an e-mail, by regular U.S. Mail,
13 you can fax us a comment, you can write a comment
14 down and hand it to us today while we're here.

15 And the deadline for submitting any
16 written comments, any supporting documentation,
17 is next Monday, February 23rd, and it includes
18 February 23rd, so you can send us an e-mail that
19 day. If you send something in the mail, make
20 sure it gets postmarked that day.

21 I've got 12 folks who have indicated they
22 would like to speak, so I'm going to make an
23 initial limit of five minutes per speaker. If we

1 get through all 12 speakers -- that'll take about
2 an hour if they each use five minutes -- and if
3 five minutes isn't enough time, any speaker can
4 come back, after all of the speakers have gone --
5 had an opportunity to speak, and talk for an
6 additional five minutes. We will keep doing that
7 until everybody has said everything that they
8 want to say. I'm not going to have a time limit
9 on a public hearing, so --

10 MR. STUCKEY: Microphone. Make
11 sure -- they have to speak into the microphone.

12 THE HEARING OFFICER: I'll need
13 everybody to come up to the podium and speak into
14 the microphone. I want everybody in the room to
15 be able to hear all of the public comments and
16 questions, and I certainly want our court
17 reporter to be able to hear.

18 So, our first person who signed up is Bill
19 Beranek.

20 DR. BERANEK: Hello. My name's Bill
21 Beranek. I am the Chair of the Marion County
22 Local Emergency Planning Committee. The
23 Committee is a state agency, with all members

1 nominated by Marion County to oversee hazardous
2 materials response in Marion County. On our
3 committee are representatives of fire
4 departments, police departments, hospitals,
5 ambulance services, health departments, public
6 works, and many industry, and also citizens.

7 First, I want to thank IDEM very much for
8 holding this public hearing. This is, as you
9 know, an issue of great concern to the
10 Indianapolis community. And second, I would like
11 to agree with Matt Stuckey that this permit is
12 far superior to the permit before. It has many,
13 many good things in it, so I strongly encourage
14 IDEM to continue that approach.

15 I will have some technical comments that
16 I'll put in writing to make it even better, but
17 for the record, I want to say, on behalf of the
18 Marion County LEPC, that our concern is that
19 periodically over the past three or four decades,
20 there have been emissions from the facility that
21 have mimicked the odorant that is required by law
22 to be put into natural gas and propane.

23 And this has caused people, from time to

1 time, when they experience that emission, to call
2 the fire department and call the gas company,
3 thinking they have a gas leak. The fire
4 department and the gas company both have to
5 respond to every such request, because they can't
6 tell when it might not be the case; therefore, we
7 have regularly ended up with many false alarms,
8 mean -- and that hurts the public response
9 capability for us for public safety, because our
10 people are where they ought not to be when the
11 real leak will occur.

12 In addition to that, many buildings
13 downtown have had disturbances and evacuations
14 over the years, including IDEM, including your
15 floor at IDEM, because of this release.

16 And finally, which is the worst that I
17 worry about, that the committee worries about, is
18 there are people in the neighborhood who don't
19 report gas leaks because they believe that it is
20 from Metalworking Lubricants, which means those
21 people have lost their ability to detect gas if
22 it is there.

23 So, I am speaking for many people and

1 organizations who request IDEM's program to use
2 its authority to work with the company to reduce
3 these serious public safety issues.

4 The final point I want to make is the
5 point about odor. Now, you have said in the
6 formal permit description, the public description
7 in the permit, that you do not have what you said
8 was legal authority to deal with odor, and yet
9 I'm aware that you have looked into odor
10 complaints. I'm aware you've taken some
11 monitoring for odor.

12 I believe that it would be right, I
13 believe you do have statutory authority to look
14 at odor, and I can give you the -- well, I have
15 already, in writing, given you the citations, but
16 you have statutory authority.

17 Therefore, if you're issuing this permit
18 for VOC's and HAP's and for SO₂, if you're doing
19 that, it seems to me it is in your authority to
20 pay attention to chemicals that could behave as
21 if they were those, such as organosulfhydryls,
22 the mercaptans, even though they are not
23 specifically those, even though they may not

1 specifically create ozone or they may not
2 specifically be an industrial chemical that the
3 HAP's list is.

4 And when you do it that way, then you can
5 pay attention to how you design your scrubber so
6 that you can take care of the mercaptan. That, I
7 think, would be wise. You can take care of the
8 mercaptan and the other at the same time with a
9 little scientific looking.

10 The monitoring for mercaptans, I can tell
11 you, is far more sophisticated than I think you
12 may be thinking it is. When you do the regular
13 monitoring that IDEM does in their monitoring
14 section, they are not looking for these
15 mercaptans that I'm talking about, the ones that
16 have very low odor thresholds, the ones that
17 could be causing the problem.

18 They're not even measuring for those, so
19 they don't see them, but that doesn't mean
20 they're not there, so -- the same thing with
21 trying to take samples for odor complaints. It's
22 very difficult, requires very sophisticated
23 equipment. I doubt even EPA has the types of

1 equipment that is needed.

2 But I would encourage you as you do this
3 permit to consider that problem and to try to
4 have the controls you put on be appropriate for
5 those mercaptans in addition to the VOC, SO₂, and
6 HAP's.

7 Looking ahead, we in Marion County LEPC
8 stand ready to work with IDEM, looking ahead, to
9 determine a practical, effective way to reduce
10 these odors while keeping within your
11 authorities. Thank you.

12 MR. STUCKEY: Thank you.

13 (Applause.)

14 MR. STUCKEY: That's fine.

15 THE HEARING OFFICER: Thank you.

16 Our next speaker is Gene Parsley, and
17 after Mr. Parsley will be David Powell.

18 MR. PARSLEY: Hi. Again, my name's
19 Gene Parsley, and I just have a few comments,
20 because we talked about stuff earlier. I just
21 want you guys to remember that they're operating
22 under a permit that they're not supposed to have;
23 okay? They're doing things that they're not

1 permitted to do.

2 It says on your paper that they have built
3 and are operating unpermitted equipment, and then
4 you say that in order for you to issue the new
5 permit, you have to believe that they're going to
6 show you that they can comply with the permit.
7 And there again, I want to make the point that
8 they have not done that in the past, so why
9 should they change their story?

10 I do like the stronger requirements, and
11 if that's the only way to get something done, but
12 I think they should be very strict and I think
13 they should be made for a shorter period of time.
14 If this company wants to work here, then they
15 should show that they want to work with the
16 citizens and with the city. Maybe give them a
17 probationary permit for a year or two, so --
18 instead of just giving them a five-year permit.

19 And also, IDEM also knows there are many
20 companies already operating in the state that are
21 doing the same thing that this company is doing.
22 So, you guys should know what these companies
23 send out through their emissions, so you guys

1 should be able to go and test and see if they're
2 putting out any of the emissions that are going
3 to be items that they can't put out, you know,
4 that would be in violation of their permit,
5 before even issuing the permit.

6 And I know that you said that it's hard to
7 make them comply when they're operating without a
8 permit. Well, that's -- there again, that's the
9 same story: They're operating without a permit.
10 There should be some kind of law or ordinance
11 that could shut them down for a period of time
12 until they get in compliance.

13 Their scrubber system, if they have one
14 now, they're not using it, like you said, so what
15 makes you think that they're going to use it in
16 the future? Yes, it will be part of their
17 permit, but that doesn't mean they're going to
18 use it. And it's also -- again, I would say
19 strict monitoring since they have been in
20 noncompliance in the past.

21 And then I think that -- this probably
22 isn't under your rule, but maybe the city or the
23 state needs to look at that piece of property and

1 determine if it should still be zoned as
2 industrial property because of the many changes
3 that have been in the city over the past ten
4 years. Maybe this property should not be zoned
5 industrial anymore.

6 And then just one last comment. I don't
7 know which road you guys came down to get here,
8 but I would say drive up and down Meridian Street
9 anywhere from Morris on down. Drive up and down
10 it every chance you get. I guarantee you, you'll
11 know exactly what we're talking about.

12 Thank you.

13 (Applause.)

14 THE HEARING OFFICER: Thank you,
15 Mr. Parsley.

16 Our next speaker is David Powell, and then
17 we'll have Jeff -- Stemenick?

18 MR. POWELL: Good evening. My name
19 is Dave Powell. I live just a few blocks away.
20 I wasn't really prepared to make a speech, but I
21 just want to say a couple of things. I really
22 enjoy living in this neighborhood a lot. I walk
23 just about every day.

1 There have been many times I start out for
2 a walk down Napoleon, and the air just really
3 stinks, and I turn around and go back inside, and
4 very disappointed. And if I did move to
5 somewhere else, my number one reason would be
6 that the air quality is poor. I think the state
7 gets fairly consistent bad marks for
8 environmental quality, and I feel that I'm sort
9 of -- we're sort of on our own here to determine,
10 in ignorance, what might be in the air.

11 If -- I learned two things tonight: That
12 the permit process sounds like a good thing, a
13 really good thing, to have happen and I'm glad
14 that somebody's working on that, that sounds like
15 a vast improvement over what it didn't have
16 before.

17 But I'm just disappointed that I feel like
18 we could take up a collection of citizens to do
19 our own test to determine what the heck is in the
20 air, because I don't have the confidence that
21 anybody really knows.

22 Thank you.

23 MR. STUCKEY: Okay.

1 (Applause.)

2 THE HEARING OFFICER: Thank you,
3 Mr. Powell.

4 Our next speaker is Jeff Stemenick --
5 Stemerick.

6 MR. STEMERICK: I don't have anything
7 to say right now. I'll just reserve my chance to
8 speak later.

9 THE HEARING OFFICER: Okay.
10 Judith Essex, and after Judith Essex will
11 be James Simmons.

12 MR. STUCKEY: It should be on.

13 MS. ESSEX: Good evening. My name is
14 Judith Essex, and I'm President of the Old South
15 Side Neighborhood Association, and first of all,
16 I would like to say thank you to IDEM for being
17 here tonight and for doing this public hearing.
18 This is an issue that is very important to our
19 area and something that we've been concerned
20 about for a long time.

21 I just have a few comments about things
22 that we're trying to do in our neighborhood. We
23 are the southwest part of Indianapolis, and we

1 are in the process of planning our future for the
2 area.

3 One of the things that we are really
4 trying to promote is economic development for the
5 area, and, of course, the Indianapolis Regional
6 Center Plan is going to be meeting with our area
7 soon, and I think one of the things that we're
8 going to have to talk about is the quality of air
9 coming from Metalworking Lubricants. That is
10 something of very high concern.

11 I imagine there's times when Lucas Oil
12 Stadium can't even open their roof because of the
13 odor that comes from that facility. It seems to
14 us that it even gets worse on weekends.
15 Something happens over there on weekends where it
16 seems to be much stronger.

17 Another thing that I'm aware of, and in
18 conversation with a neighbor of mine who is --
19 her health is already compromised with a liver
20 transplant, and she informed me when we were
21 talking about this meeting that she can't even be
22 outside, because it just really makes her ill.
23 And it even permeates her home, and because her

1 health is already compromised, this is a real
2 issue for her.

3 Another thing that has concerned me about
4 this business is that I really don't think that
5 they showed good business practice for their --
6 they are not a good neighbor. They allow trucks
7 to come through our neighborhood where weight
8 restrictions are already posted.

9 I happened to follow a great big tanker
10 truck down into the facility, and as he got on
11 the weigh station, I asked him how much his truck
12 weighed, and he said, "Eighty thousand pounds."
13 I said, "Well, you know, the street you just came
14 down has a weight restriction of 11,000 pounds."
15 He said, "Well, this is the route that the
16 company tells me to take through the neighborhood
17 to get here." So, it really concerns me about
18 their businesses practices and being a good
19 neighbor to us.

20 I think, in the final analysis, that we're
21 all concerned about our quality of life. My
22 husband and I are relatively new to the area. We
23 do live upwind. We are northeast of the

1 facility, just about four blocks, and it really
2 limits the time that you can spend outside at
3 times.

4 And I think for some people who are very
5 sensitive to smell, some more than others, that
6 it really does affect our quality of life,
7 especially for what we're trying to accomplish in
8 the neighborhood, and knowing that there's going
9 to be a lot of growth, there's going to be more
10 hotels, there's going to be more restaurants over
11 by Lucas Oil Stadium, and I just feel that the
12 business needs to come in compliance and be a
13 good neighbor to us in the downtown area.

14 So, thank you very much.

15 (Applause.)

16 THE HEARING OFFICER: Thank you for
17 your comments.

18 Our next speaker is James Simmons, and
19 then we'll hear from Crystal Bridgewater.

20 MR. SIMMONS: Thank you.

21 Judith Essex just spoke eloquently, more
22 eloquently than I could, about the quality of
23 life issue here. A few years ago -- this doesn't

1 relate to IDEM because this is a city matter, but
2 an attorney from the city gathered together a
3 group of neighborhood leaders from the area most
4 affected by this -- the odor. We all gave
5 testimony. The city attorney, the attorney from
6 the city, and another person diligently took
7 notes, and we never heard anything again.

8 One of the things that was mentioned in
9 that meeting is that we have a pretty diverse
10 demographic here. And particularly in the
11 summertime when it's very hot out and these odors
12 occur, many people can close their windows turn
13 on the air conditioner and not have to live with
14 it, but there are a lot of people in this area
15 here who can't do that, who have to live with
16 this odor day and night. So, I just want to
17 mention that as a significant quality of life
18 issue for us.

19 I'm also aware, as are many people, that
20 during the Super Bowl period, the Mayor's Office
21 prevailed on this emitter not to operate the week
22 of the Super Bowl. Now, I don't know, and I'm
23 sure some people know, what the reason was. I

1 assume that -- perhaps wrongly -- that that was
2 because of the odor that emanates from this
3 business and permeates downtown as well as the
4 south side.

5 But -- but it strikes me as -- and again,
6 this is no reflection on your work, but it
7 strikes me as unfair and unfortunate that we can
8 provide clean air and nonsmelly air for our
9 visitors who come for the Super Bowl, but not for
10 our citizens who are in the path of this odor
11 every day.

12 And lastly, on a personal note, back to
13 this summertime issue, three of our four kids
14 live out of town, as do seven of our
15 grandchildren. Two of our daughters come -- used
16 to come in the summertime and bring our
17 grandchildren with them, five grandchildren, but
18 they became so concerned about the odors and the
19 nonanswers about what might be constituents of
20 those odors, they don't come in the summertime
21 anymore. Again, that's a quality of life issue.

22 Thank you for listening.

23 (Applause.)

1 THE HEARING OFFICER: Thank you,
2 Mr. Simmons.

3 Our next speaker is Crystal Bridgewater,
4 and then Tom Dale.

5 MS. BRIDGEWATER: I want to say I
6 appreciate you guys for giving us the opportunity
7 to speak and give our complaints. I'm
8 affiliated -- my name is Crystal Bridgewater.
9 I'm affiliated with the South Side Neighborhood
10 Association, and I also am a homeowner over on
11 the southwest side of town.

12 My concern is that I've been there for
13 eight years now, and the odor is real strong, to
14 where it comes in your home, it penetrates there
15 for a while there, and then sometimes it comes
16 through even during the midnight hours, where I
17 have a hard time, you know, sleeping because of
18 the odor.

19 And another thing is I do get headaches
20 from it, I'm nauseated from it, and then I have
21 abdominal pains that come about when that comes
22 through. I have two sons. My oldest one, he had
23 bought a respirator, so I feel like we're going

1 to have to invest in, you know, a respirator,
2 because it's so annoying, you know, and it's just
3 uncomfortable. So, that was my complaint.

4 Thanks.

5 (Applause.)

6 THE HEARING OFFICER: Thank you for
7 your comments.

8 Our next speaker is Tom Dale, then after
9 Mr. Dale will be Tom Beck.

10 MR. DALE: Thank you. I also want to
11 thank you for coming tonight and, you know,
12 putting on this event. And Julie, your
13 communication to a lot of us has been really
14 good. I think you see a result of that
15 communication.

16 I'm Tom Dale. I own Midwest Computer
17 Accessories at 850 South Meridian. I'm right
18 next door to probably the biggest, most
19 well-known landmark in our neighborhood,
20 Shapiro's Delicatessen. I've been there for 28
21 years running my business there. I live directly
22 south about eight miles, so I drive up and down
23 Meridian Street a lot; okay?

1 And this gentleman on my left, I really
2 never thought much about the errors. I can't
3 tell you how many times I've called 911 to report
4 a gas leak starting, I'm going to say, at Sumner
5 Avenue and Meridian. Sumner is about -- I want
6 to say 3500 South.

7 And then moving north, you know, the
8 stench and the contaminants in the air, you know,
9 especially when my window's down and I'm driving
10 home or driving to work, it's -- you know, it's
11 consistent, and I hope that we can do something
12 about this. It sounds like the permits have not
13 been strong enough, and you're going to see to it
14 that we get those.

15 I want to just talk a little bit about the
16 neighborhood. I'm -- I am in the old south side
17 neighborhood, my business is. We have a Stadium
18 Village Business Association made up of about 30
19 businesses in the area, and we have really tried
20 to get more development in our neighborhood.
21 It's difficult.

22 We had a CDC. You all know what a CDC is,
23 community development corporation, called the

1 Concord CDC. We had that in place for about --
2 oh, about ten years, and it recently failed, and
3 I can tell you that it's not an accident that
4 this entity failed. You know, we just struggled
5 to get development going in this neighborhood,
6 and nobody wants to develop and spend money in a
7 neighborhood when you have this kind of air that
8 we have to breathe.

9 And I don't live there. I'm a businessman
10 there, so I don't experience a lot, but I can
11 tell you the area in and around this location,
12 this business, is probably the most socially
13 disadvantaged folks in our area.

14 And lastly, I want to talk about just
15 lifting the neighborhood up. You know, we've
16 been working with the city on a quality of life
17 plan, trying to get that in place, a development
18 plan, and we're the last area of Indianapolis in
19 the region, the mile square, if you will, to get
20 any kind of real development, other than Lucas
21 Oil. That was a great building to have in our
22 community and it's lifted us up a little bit.
23 But if we can enforce this with these new permits

1 and these new standards, it will really lift up
2 this neighborhood and the residents and
3 businesses around it.

4 Thank you.

5 (Applause.)

6 THE HEARING OFFICER: Our next
7 speaker is Tom Beck, and then Allyson Roselee.

8 MR. BECK: I guess when I signed up,
9 I didn't realize it was for the hearing, but I
10 spoke earlier. I guess maybe I just want to get
11 a better understanding of this whole process, and
12 so I thank you very much for helping to explain
13 that to all of us.

14 I think, first of all, just the crowd here
15 I think is indicative of how important this is to
16 our area, so I just hope that when you go back --
17 I understand now that this tougher permitting
18 process is obviously very important, and so I
19 encourage you to, you know, strengthen the
20 enforcement related to that new permit, because
21 obviously it's extremely important to all of the
22 neighbors here on the near south side.

23 And, you know, I smell the odor when I'm

1 on the south side of downtown, and there's, you
2 know, 150,000 people that work downtown, and
3 visitors and tourists and all of those kinds of
4 things, so please just remember how important
5 this is to this -- you know, the largest city in
6 the State of Indiana.

7 Thank you.

8 (Applause.)

9 THE HEARING OFFICER: Thank you,
10 Mr. Beck.

11 We'll hear from Allyson Roselee, and next,
12 James Brightwell.

13 Go ahead.

14 MS. ROSELEE: Good evening. My name
15 is Allyson Roselee. I've lived here by Judith in
16 that neighborhood for about 11 years. I bought a
17 rehabbed home from the CDC that was mentioned
18 earlier, so my house was built up brand new.
19 It's a modern house, a sealed house with good
20 windows and everything, and even still, this odor
21 permeates everything all of the time.

22 I'm frequently not able to sit out on my
23 porch or deck due to this odor. It's nauseating,

1 nauseating to me, my partner, and guests that I
2 have over. On several occasions, I've had to
3 apologize for the embarrassing stench, because
4 it's offending my guests. I really have to
5 consider what all I'm going to have to do to get
6 people over to my house on a Saturday night,
7 because a lot of them will decline due to the
8 odor.

9 This has affected me in economic ways.
10 Two people that I'm friends with have declined to
11 buy homes in this neighborhood due to the
12 effluent. This has affected me because the homes
13 were subsequently sold to landlords who provide
14 substandard housing to renters of questionable
15 character and behavior, so that affects my
16 property value. I'm also denied the enjoyment of
17 having my friends and family in my neighborhood.

18 One of the gentlemen spoke earlier about
19 having to smell the effluent because they don't
20 have air conditioning. I can tell you, you still
21 smell it even with the air conditioning on. But
22 due to the fact that my partner has asthma, I
23 frequently have to just run the air conditioner,

1 so there's crazy money going out the window for
2 my electric bill, rather than enjoying the four
3 or five nights that the weather's pleasant here.

4 (Laughter.)

5 MS. ROSELEE: Also, one last thing,
6 going back to the phantom gas odors, on a report
7 from one of my neighbors, my front yard got dug
8 up by Citizens Gas, and one of my lovely little
9 boxwoods died because they were hunting for a
10 phantom gas leak. So, that's pretty much trashed
11 my tiny little front yard.

12 And that's about it. Thank you very much.

13 (Applause.)

14 THE HEARING OFFICER: James
15 Brightwell, and then Abraham Olson.

16 MR. BRIGHTWELL: Hi. I'm -- excuse
17 me -- Jim Brightwell, and I spoke earlier about
18 the system and talking. I just meant in --
19 excuse me -- in relationship to we as state --
20 you as state people are here to take care of us,
21 and so to be able to hear the other -- have the
22 other people be heard, I think it's important.

23 A lot that was said is exactly what I

1 wanted to say. I adjoin that facility,
2 Metalworking Lubricants, and that facility has
3 run just rampant over the years, and I'm glad to
4 see that the permitting process is going.

5 The only thing that I would really want to
6 sum up and say is all you guys that live here in
7 Indy and around Indianapolis, I'm sure most of
8 you do not live in Center Township, but basically
9 we just need to do the right thing, for we have a
10 great city. We have a great mayor. I think if
11 Mayor Ballard was staying longer, he would see
12 that that problem was taken care of. And Pence
13 can do the same thing also.

14 Even under the nuisance, as was spoken
15 earlier, we don't need to have all of our
16 visitors smell this material, and as was said
17 earlier with the shutdown during the Super Bowl,
18 that happened. And there's no reason we can't
19 continue having a great city, and it's the only
20 thing that's holding our downtown back.

21 If you'll just look through the old air
22 records, you'll see IUPUI, Lilly's, everyone,
23 that emissions has got into their air exchangers.

1 So, right now it's time do something under the
2 nuisance policy.

3 Thank you.

4 (Applause.)

5 THE HEARING OFFICER: Thank you.

6 Abraham Olson, and after Mr. Olson, Lisa
7 Laflin.

8 MR. OLSON: Thank you for being here
9 this evening and hearing our comments.

10 One thing that hasn't been addressed so
11 far is, even though there's a sizable crowd here
12 tonight, there are probably many more people who
13 would be here if they knew about it, if they were
14 aware of it, and they had the capability to get
15 here, but this is a poor neighborhood.

16 For many people living in the area just
17 east of the plant and around it, there is really
18 nowhere else for them to go, and unless they're
19 on-line checking news updates or the next-door
20 Web sites or IDEM's Web site itself, they're not
21 aware of what they have the capability to do.

22 And even if they did, they'd have a hard
23 time getting here. Many people would have to

1 walk. Many people couldn't even make an evening
2 meeting because they're working a second shift.
3 If I did my Census Bureau work correctly this
4 morning, the average income for the neighborhood
5 is about 19k a year per household. That's far
6 below the national average.

7 So, this is really a matter of
8 environmental justice as well. It's a matter
9 that's affecting a population which has a hard
10 time defending itself from the practices of
11 nearby neighbors that may be infringing on their
12 air quality, and so I'd just like to encourage
13 you to take this seriously, that you're working
14 on behalf of us, you're working on behalf of all
15 of the people in all of these houses.

16 And we'd really like to know what's
17 happening, and if there's anything that you can
18 do to let us know what's happening, if there's
19 anything you can do to work with the groups that
20 are in the neighborhood, to be able to let the
21 neighbors know what's going on, we'd love to hear
22 that and we'd love to keep up to date.

23 Thank you.

1 (Applause.)

2 THE HEARING OFFICER: Thank you,
3 Mr. Olson.

4 Our next speaker is Lisa Laflin, and then
5 Jeff Veldhof.

6 MS. LAFLIN: Good evening. I am the
7 Mayor's neighborhood liaison for the south part
8 of Center Township. I have the honor and
9 privilege to represent neighbors who live from
10 Holt Road all of the way over to Emerson,
11 basically from downtown to Troy Avenue.

12 And I have residents who, since 2010, have
13 been e-mailing me about this smell, this unknown
14 air contaminant that seeps into their homes, that
15 affects them when they try to go for a walk, when
16 they're driving through the area now, and they've
17 been asking me, "What is the smell? Where is it
18 coming from? What can we do about it? Who
19 should I call?" from neighborhoods as far away as
20 Prospect and Pleasant Run.

21 So, the old south side is here tonight in
22 force. That neighborhood starts at the river,
23 goes over to Madison Avenue. Metalworking

1 Lubricants sits right in the heart of that
2 neighborhood, and they are probably the most
3 impacted. The wind comes out of the west. It
4 blows straight into the Concord Neighborhood
5 Center, which serves youth and the elderly and
6 the neighborhood.

7 It blows over into Sacred Heart Church.
8 It blows across Madison into School 31, which is
9 an elementary school, serves K through 8, and
10 then over into neighborhoods -- depending on the
11 direction of the wind, it blows right here into
12 Manual High School, over into Garfield Park, into
13 the Garfield Park Library, and into all of the
14 neighborhoods between there and until the wind
15 takes it on out into the atmosphere.

16 So, I would really ask tonight that as you
17 are writing this permit, that you consider making
18 sure that the requirements for the scrubber --
19 and thank you very much for putting the scrubber
20 into the permit, but that the requirements for
21 the scrubber take into account those levels of
22 odors, air contaminants, that need to get picked
23 up to affect what it is that these people are

1 smelling, that is having such an adverse effect
2 on their quality of life.

3 The fathers over at Sacred Heart tell me
4 that sometimes on Sunday mornings when church is
5 letting out or before church is letting out, it's
6 really, really difficult, especially in the
7 summer, of course, but it's just an overpowering
8 odor. And at the Concord Center sometimes,
9 again, especially in the summer, it's really
10 difficult to have the kids outside and playing.

11 So, anything that you can do to help
12 mitigate this, we'd appreciate it, and thank you
13 for your time today.

14 (Applause.)

15 THE HEARING OFFICER: Our next
16 speaker is Jeff Veldhof, and then Dan Forestal.

17 MR. VELDHOF: Hi. My name is Jeff
18 Veldhof, and I'm really here --

19 AUDIENCE MEMBER: Microphone.

20 MR. VELDHOF: Is it on? Is it
21 better?

22 MR. STUCKEY: It should be -- okay.

23 AUDIENCE MEMBER: There you go.

1 MR. VELDHOF: Thank you.

2 I'm really here representing a couple of
3 different things. First of all, I'm a business
4 owner. I own Lauck & Veldhof Funeral Home, so
5 I'm directly east of this plant, so I mean
6 there's one row of homes and then there's some
7 woods and then there's the plant. So, if you go
8 on Google Earth, it's really interesting. I'm
9 very, very close to this thing.

10 I'm also the treasurer at Sacred Heart
11 Catholic Church, and on behalf of Father Larry
12 Janezic, he's asked me to come in here and speak
13 on his behalf as well.

14 It is very difficult. I live above the
15 funeral home. So, you know, I work there, I'm
16 there all day, and then I'm there in the evening,
17 and there have been times that it's really been
18 embarrassing for me when families come and they
19 want to know what the odor is, you know, and, of
20 course, I let them know, and I always hope and
21 pray that when people are coming in, the wind's
22 blowing a different direction, and fortunately it
23 does blow a different direction quite often.

1 On behalf of the church, it's very
2 frustrating for us, because, you know, we're an
3 older church, we're in an older neighborhood, and
4 as the financial chair and treasurer, it's not
5 easy paying our bills sometimes, and people don't
6 want to come to church when they smell that nasty
7 smell.

8 And a lot of times it gets caught in the
9 church, too, so sometimes when the wind blows,
10 you know, it ends up in there and it doesn't
11 leave for a few days, even when the wind changes
12 direction. So, it's very frustrating for us.

13 I also own a home on Union Street, and my
14 mother-in-law lives there, and I have three
15 nieces that are there, and they're very small,
16 you know, two four-year-old twins and then a
17 12-year-old, and it's embarrassing for them, too,
18 especially the 12-year-old, when she wants her
19 St. Rock friends to come over, and they don't
20 want to come over because the air is so bad.

21 So, I'm encouraged to hear about the new
22 permit. I think that's wonderful, and I just
23 hope that you'll enforce it, because it's been my

1 understanding they haven't run the scrubber in a
2 long, long time. And I think that might solve a
3 lot of the problems, at least I'm hoping so.

4 Anyway, we hope that you'll definitely do
5 a lot of monitoring of the permit, and when
6 possible, give them all of the fines you possibly
7 can. They've made our life miserable, and we
8 just hope that they have to experience some of
9 the toughest things possible, maybe even put them
10 out of business.

11 AUDIENCE MEMBER: Yes.

12 MR. VELDHOF: So, thank you.

13 (Applause.)

14 THE HEARING OFFICER: Dan Forestal,
15 and after Mr. Forestal, Justin Moed.

16 MR. FORESTAL: Is this on? Okay.

17 Good evening. My name is Dan Forestal,
18 and I represent Indiana's 100th District in the
19 Indiana General Assembly. The District is
20 essentially Irvington to 21st and Shadeland, down
21 to the Lockerbie neighborhood just east of the
22 city, and then including Fountain Square.

23 I was actually just standing in the back

1 of the room talking with Lisa Laflin, and I said,
2 "How long have we been doing this, Lisa?" And
3 she said, "Well, we've been having this fight for
4 20 years." And I have been meeting with people
5 like Bill and Lisa for the better part of two
6 years now. I've had meetings with federal
7 officials, state officials, IDEM, as a matter of
8 fact. We've been talking about this for a long
9 time.

10 I hope sincerely that this represents a
11 conclusion to this issue. It is an odd position
12 to be in to have this much grassroots
13 participation and this many people clamoring for
14 a solution and to have it take a very long time.

15 But I am hopeful and I am optimistic that
16 this will be a change for the better, that my
17 constituents in neighborhoods like Lockerbie and
18 Holy Cross will no longer have their quality of
19 life impacted by one business who refuses to do
20 the right thing over and over and over again.

21 In addition to being a legislator, I am
22 also an Indianapolis firefighter, and so I know
23 very well that at Station 13 especially, the

1 closest one, which is downtown on Ohio Street,
2 just behind the Statehouse, they run on these
3 kinds of runs because they hear -- they smell --
4 or people call in for a gas odor smell.

5 And actually, knowing that we had this
6 meeting tonight, something crossed my mind. We
7 had a fire truck and an ambulance parked outside
8 of the Statehouse, and they were going in to help
9 somebody, and it occurred to me, as I was walking
10 outside and I kind of saw the scene, that if they
11 were gone on a gas odor run, you'd be waiting
12 even longer for another fire truck or an
13 ambulance to come across, and if it was very
14 serious, it could literally be life and death.

15 And I think knowing that that has been
16 going on for so long is probably disheartening to
17 some people, but I think what you see here is a
18 group that is mobilized and energized to change
19 things for the better and to make sure that this
20 business becomes a good neighbor, which I think
21 we all agree, that time has come.

22 Frankly, I think we live in a beautiful
23 city, and in particular, I think my district is a

1 wonderful place. It includes Irvington, Fountain
2 Square and Lockerbie, like I said, and I think it
3 would be wrong for us to do all of the great
4 things we do to make this city a great place to
5 live, to encourage people to want to come into
6 these neighborhoods, young professionals, to
7 raise families and get jobs and move close to the
8 city, and then force them to put up with this
9 odor that nauseates some people, other people
10 it's just unpleasant, but regardless, it's a
11 chemical odor that is in the air, and it is
12 affecting people's quality of life, and I think
13 that runs counter to everything else we do in the
14 city to attract the best and brightest and trying
15 to make our neighborhoods the best places they
16 can be.

17 So, I stand here this evening ready to
18 work with leaders in the House and whoever else
19 will join to make sure that we hold Metalworking
20 Lubricants to a higher standard, to a standard
21 where they become good neighbors like they always
22 should have been.

23 I do think that it is important to heed

1 the wisdom that is represented in this room.
2 These are a lot of folks who have lived under
3 this odor for 20 years, some five, but
4 regardless, their quality of life has been
5 impacted by one bad actor, one very bad actor,
6 who has decided that they are just not going to
7 play by the rules that everybody else plays by.

8 And so, I am hopeful, and I support the
9 effort to place them under a permit where they
10 can finally be held responsible for the odor and
11 the chemicals that they put into the air. I look
12 forward to working with you going forward, and I
13 hope that this will, like I said, be a
14 conclusion.

15 And I will continue working with members
16 of the Assembly, like Rep. Moed, who is here with
17 me today, to make sure that Indianapolis and the
18 surrounding neighborhoods near downtown stay
19 wonderful places to live, and where companies
20 cannot just pollute the air around them and make
21 the air smell terrible and get away with it. And
22 so, I look forward to that day coming and that
23 conclusion.

1 Thank you.

2 (Applause.)

3 THE HEARING OFFICER: Rep. Moed, and
4 then Darrell Unsworth -- Darrell Unsworth.

5 REP. MOED: Thank you. My name is
6 Justin Moed, and I'm the State Representative for
7 House District 97. I serve 64,000 people who
8 live in Downtown Indianapolis and the near south
9 and west side of the city. The facility that
10 we're talking about also resides inside this
11 district.

12 I'm a resident of Garfield Park, and as I
13 look around the room, I see friends, neighbors,
14 constituents who I've met at their door and who
15 are affected by this terrible problem. As I've
16 gone door to door, I've heard concerns from
17 neighborhoods like Babe Denny, the Old South
18 Side, Bates-Hendricks, Stadium Village, Garfield
19 Park, and South Village Neighborhood about the
20 problem that continues to emanate from
21 Metalworking Lubricants.

22 I think the crowd here tonight is
23 indicative of how much people care about this

1 problem and how they seek a solution to it. I'm
2 requesting and demanding that you do all you can
3 to help enrich the lives of those who you serve.
4 The people behind me seek answers. I was sent to
5 the Statehouse to have their back. If you stand
6 up and join me, I'll have your back as well.

7 Thank you, and let's hold these guys
8 accountable.

9 (Applause.)

10 THE HEARING OFFICER: Darrell
11 Unsworth, and then David Buchanan.

12 MR. UNSWORTH: Hello. I'm Darrell
13 Unsworth. My wife and I own a home in Garfield
14 Park. Our grown children have homes in the
15 Concord area, near the Concord Center. My
16 grandkids attend after-school programs at the
17 Concord Center.

18 I'm a past-president of Southeast
19 Neighborhood Development. I've worked in urban
20 development and brownfield redevelopment over the
21 years, have had very good partnerships with IDEM.
22 You guys have been a good help to us as we clean
23 up a brownfield and industrial areas and recreate

1 opportunities for new businesses to come in.

2 I'm concerned when the kids go to
3 after-school programs at Concord and Concord's
4 afraid to put them outside. There's something in
5 the air, you know? We have Garfield Park, which
6 is a historic -- actually, aside from being
7 historic, it is the most beautiful park in the
8 City of Indianapolis, and we're right there.

9 And often in the summertime you can't walk
10 in the park just because it stinks. It burns
11 your eyes. It's -- you know, there's something
12 going on there, and that stench, there's
13 something in the air. I don't know what it is,
14 but we're very concerned about it.

15 We're concerned about how it's affecting
16 our health, and encourage you as you write this
17 new permit to put the strongest terms possible
18 you can on the thing. I know it's been said a
19 couple of times here tonight, but if there's any
20 provisions for a probationary permit that would
21 allow you to not just get them into the loop and
22 off the hook for five years, but to throw some
23 teeth in it and drag them back into this process

1 again if they don't comply, please do that.

2 We've had good partnerships with IDEM in
3 the past, and I hope we can do that going
4 forward. So, help us out. We need you for this.

5 Thank you.

6 (Applause.)

7 MR. BUCHANAN: Hi. I'm David
8 Buchanan. I live basically right next door to
9 Rolls-Royce. I bought in the neighborhood 21
10 years ago. When I bought there, people told me I
11 was an idiot, literally, for buying on the Old
12 South Side. And I have loved the neighborhood, I
13 love where I live.

14 It is interesting to me that this odor
15 tends to be mostly on the weekends. You know,
16 that's where I notice it the most, and that's the
17 days -- I have this incredible front porch that I
18 sit on, on the weekends. I have a lot of
19 tourists walk by me saying, "Where's Shapiro's?"

20 (Laughter.)

21 MR. BUCHANAN: And it's amazing to me
22 how many days they'll also go, "And what is that
23 odor?"

1 There's an international company right
2 across the street from me. This is affecting the
3 visibility of Indianapolis. This is affecting
4 the visibility of the State of Indiana. It's
5 not -- it is one business trying to make a
6 living. I totally understand that. So am I. I
7 am a landlord.

8 I actually had one person say they
9 wouldn't rent from my house because of the odor.
10 They were looking at it, and they said, "I'm
11 sorry; if this is an odor that's constant --"
12 which it is "-- then I can't live here." So,
13 that business is affecting my business, and I
14 think there needs to be some balance on it.

15 Thank you.

16 (Applause.)

17 THE HEARING OFFICER: Those are all
18 of the speaker sheets I have. If anyone would
19 like to come down and speak, please feel free to
20 do so now. Just state your name. If anyone
21 who's already spoken wants to make additional
22 comments, please feel free to do that now.

23 MR. PARDUE: My name is Richard

1 Pardue, and I've been invested in some property
2 that is adjacent to Metal Lubricants, about six
3 acres there, and Jim there, he also owns some
4 property next to mine.

5 And I really started talking with a lot of
6 the neighbors there in the neighborhood, and I
7 had a constant problem with the real estate that
8 I have about people coming from outside of the
9 neighborhood and dumping all kinds of trash on
10 the property. Jim's had that problem, too.

11 We don't know what's in this trash that
12 they're dumping. It could be -- they've dumped
13 mattresses there. There could be bed bugs in
14 them. They've dumped cans there that have liquid
15 in them and things. And every time this happens,
16 the Board of Health or something instantly -- I
17 mean instantly I get something in the mail and I
18 get fined, and I pay that fine.

19 And I'm down there continually mowing the
20 weeds and the grass, and I think what I'm in
21 violation of is very minute, and I really mean
22 minute, as compared to the air quality that's in
23 that neighborhood. I've been out there mowing on

1 my tractor, and I feel sorry for people, because
2 I've actually had to put a mask on when I get
3 close over there to the plant.

4 And if the neighbors -- one of the local
5 authorities that have something to do with the
6 Board of Health or people dealing with properties
7 come out, and they said even if the neighbors in
8 that neighborhood burn a small amount of trash,
9 they're going to get fined because they're in
10 violation of the air pollution. Air pollution
11 from a little burnt trash or paper out of some
12 garbage cans is nowhere near as volatile as
13 what's coming out of that plant.

14 AUDIENCE MEMBER: Yes.

15 (Applause.)

16 MR. PARDUE: And if that -- and if
17 people can't live in the neighborhood, you know,
18 there is a lot more people in that neighborhood
19 than are here. If they don't have the right to
20 breathe the proper air -- and I think it's a
21 significant health hazard.

22 I don't know why somebody hasn't done
23 something of a more legal nature to stop this,

1 because if they were violating simple trash,
2 everybody in this room that lives there would be
3 fined, and it's on record that I have been fined.

4 And I would just like to know what -- if
5 the regulations are in place to fine these people
6 that are comparable to what these people could be
7 fined, I think that would be fair and just, and I
8 think the state representatives in here need to
9 speak a lot higher to get something done for the
10 people in this neighborhood, because they're
11 human beings and they have a right to breathe
12 clean air.

13 Thank you.

14 (Applause.)

15 THE HEARING OFFICER: Is there anyone
16 else who wishes to speak?

17 MR. BRIGHTWELL: I have one last
18 thing to say. I'm originally from Louisville,
19 Kentucky, but I moved up here about --

20 MR. STUCKEY: I'm sorry; can you
21 state your name one more time for the court
22 reporter?

23 MR. BRIGHTWELL: Jim Brightwell.

1 MR. STUCKEY: Thank you.

2 MR. BRIGHTWELL: I originally moved
3 up here about 35 years ago, and I remember on the
4 north side, we had a real pungent odor from a
5 refinery up there. That went on for a little
6 while on the north side, then it got shut down,
7 the smell got taken care of.

8 And I just ask you to do the same thing,
9 not to necessarily run Metalworking Lubricants
10 out of business, no, because they have a right to
11 operate just like anyone else, but they have a
12 right to be a good neighbor also.

13 So, thank you.

14 (Applause.)

15 MS. JACK: Hello. My name is
16 Christine Jack, and I work for Concord
17 Neighborhood Center, and I'm here tonight to
18 represent the voice of the individuals and
19 families who attend Concord Neighborhood Center.
20 And basically, as you've heard throughout the
21 night, many of their comments are the same health
22 concerns, embarrassment, wondering if things are
23 ever going to change.

1 But most importantly, why I wanted to
2 speak was to make sure their voices are heard
3 since they couldn't be here tonight. So, please
4 take that into consideration as you move forward
5 in the process. As was stated earlier, there's
6 many people's voices who haven't been heard
7 tonight who would love to get the chance to, but
8 aren't able to be here.

9 So, thank you.

10 (Applause.)

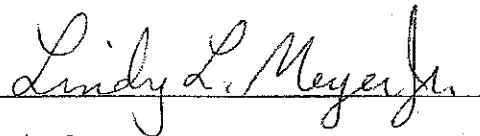
11 THE HEARING OFFICER: Okay. Well, I
12 want to thank you all for coming to tonight's
13 public hearing. I see no more speakers headed
14 this way. This hearing is closed.

15 (Applause.)

16 - - -
17 Thereupon, the proceedings of
18 February 16, 2015 were concluded
19 at 8:08 o'clock p.m.
20 - - -
21
22
23

1 CERTIFICATE

2 I, Lindy L. Meyer, Jr., the undersigned
3 Court Reporter and Notary Public residing in the
4 City of Shelbyville, Shelby County, Indiana, do
5 hereby certify that the foregoing is a true and
6 correct transcript of the proceedings taken by me
7 on Monday, February 16, 2015 in this matter and
8 transcribed by me.

9
10 

11 Lindy L. Meyer, Jr.,

12 Notary Public in and
13 for the State of Indiana.

14
15 My Commission expires October 27, 2016.
16
17
18
19
20
21
22
23

0	9	41:20, 41:21, 44:5, 44:13, 47:22, 48:10, 48:20, 49:12 alarms [1] - 7:7 Alexander [1] - 2:3 allow [2] - 17:6, 44:21 Allyson [4] - 2:11, 25:7, 26:11, 26:15 amazing [1] - 45:21 ambulance [3] - 6:5, 39:7, 39:13 amount [1] - 48:8 analysis [1] - 17:20 annoying [1] - 22:2 answers [1] - 43:4 anyway [1] - 37:4 apologize [1] - 27:3 APPEARANCES [1] - 2:1 Applause [22] - 10:13, 13:13, 15:1, 18:15, 20:23, 22:5, 25:5, 26:8, 28:13, 30:4, 32:1, 34:14, 37:13, 42:2, 43:9, 45:6, 46:16, 48:15, 49:14, 50:14, 51:10, 51:15 APPLICATION [1] - 1:5 application [1] - 3:21 appreciate [2] - 21:6, 34:12 approach [1] - 6:14 appropriate [1] - 10:4 area [16] - 15:19, 16:2, 16:5, 16:6, 17:22, 18:13, 19:3, 19:14, 23:19, 24:11, 24:13, 24:18, 25:16, 30:16, 32:16, 43:15 areas [1] - 43:23 aside [1] - 44:6 Assembly [1] - 37:19 assembly [1] - 41:16 association [3] - 15:15, 21:10, 23:18 assume [1] - 20:1 asthma [1] - 27:22 atmosphere [1] - 33:15 attend [2] - 43:16, 50:19 attention [2] - 8:20, 9:5 attorney [3] - 19:2, 19:5 attract [1] - 40:14 AUDIENCE [6] - 3:7, 3:14, 34:19, 34:23, 37:11, 48:14	Auditorium [1] - 1:15 authorities [2] - 10:11, 48:5 authority [5] - 8:2, 8:8, 8:13, 8:16, 8:19 avenue [2] - 23:5, 32:11 Avenue [3] - 1:16, 1:22, 32:23 average [2] - 31:4, 31:6 aware [6] - 8:9, 8:10, 16:17, 19:19, 30:14, 30:21	bills [1] - 36:5 bit [2] - 23:15, 24:22 blocks [2] - 13:19, 18:1 blow [1] - 35:23 blowing [1] - 35:22 blows [5] - 33:4, 33:7, 33:8, 33:11, 36:9 Board [2] - 47:16, 48:6 bought [4] - 21:23, 26:16, 45:9, 45:10 Bowl [4] - 19:20, 19:22, 20:9, 29:17 boxwoods [1] - 28:9 brand [1] - 26:18 breathe [3] - 24:8, 48:20, 49:11 bridgewater [1] - 18:19 Bridgewater [3] - 2:9, 21:3, 21:8 BRIDGEWATER [1] - 21:5 brightest [1] - 40:14 Brighton [1] - 1:22 BRIGHTWELL [4] - 28:16, 49:17, 49:23, 50:2 Brightwell [5] - 2:11, 26:12, 28:15, 28:17, 49:23 bring [1] - 20:16 brownfield [2] - 43:20, 43:23 BUCHANAN [2] - 45:7, 45:21 Buchanan [3] - 2:15, 43:11, 45:8 bugs [1] - 47:13 building [1] - 24:21 buildings [1] - 7:12 built [2] - 11:2, 26:18 Bureau [1] - 31:3 burn [1] - 48:8 burns [1] - 44:10 burnt [1] - 48:11 business [16] - 17:4, 17:5, 18:12, 20:3, 22:21, 23:17, 23:18, 24:12, 35:3, 37:10, 38:19, 39:20, 46:5, 46:13, 50:10 businesses [4] - 17:18, 23:19, 25:3, 44:1 businessman [1] - 24:9 buy [1] - 27:11 buying [1] - 45:11
1	A	B		
100th [1] - 37:18 11 [1] - 26:16 11,000 [1] - 17:14 12 [2] - 4:21, 5:1 12-year-old [2] - 36:17, 36:18 12922 [1] - 1:22 13 [1] - 38:23 150,000 [1] - 26:2 16 [4] - 1:17, 3:1, 51:17, 52:7 19k [1] - 31:5	abdominal [1] - 21:21 ability [1] - 7:21 able [7] - 5:15, 5:17, 12:1, 26:22, 28:21, 31:20, 51:8 above-captioned [1] - 1:11 Abraham [3] - 2:12, 28:15, 30:6 accessories [1] - 22:17 accident [1] - 24:3 accomplish [1] - 18:7 account [1] - 33:21 accountable [1] - 43:8 ACCURATE [1] - 1:21 Acker [1] - 2:4 acres [1] - 47:3 actor [2] - 41:5 addition [3] - 7:12, 10:5, 38:21 additional [2] - 5:6, 46:21 addressed [1] - 30:10 adjacent [1] - 47:2 adjoin [1] - 29:1 adverse [1] - 34:1 affect [2] - 18:6, 33:23 affected [4] - 19:4, 27:9, 27:12, 42:15 affecting [6] - 31:9, 40:12, 44:15, 46:2, 46:3, 46:13 affects [2] - 27:15, 32:15 affiliated [2] - 21:8, 21:9 afraid [1] - 44:4 after-school [2] - 43:16, 44:3 agency [1] - 5:23 ago [3] - 18:23, 45:10, 50:3 agree [2] - 6:11, 39:21 ahead [3] - 10:7, 10:8, 26:13 air [30] - 14:2, 14:6, 14:10, 14:20, 16:8, 19:13, 20:8, 23:8, 24:7, 27:20, 27:21, 27:23, 29:21, 29:23, 31:12, 32:14, 33:22, 36:20, 40:11, 41:11,	Babe [1] - 42:17 bad [4] - 14:7, 36:20, 41:5 balance [1] - 46:14 Ballard [1] - 29:11 Bates [1] - 42:18 Bates-Hendricks [1] - 42:18 beautiful [2] - 39:22, 44:7 became [1] - 20:18 Beck [4] - 2:10, 22:9, 25:7, 26:10 BECK [1] - 25:8 become [1] - 40:21 becomes [1] - 39:20 bed [1] - 47:13 BEFORE [1] - 1:1 begin [1] - 3:10 beginning [1] - 3:23 behalf [6] - 6:17, 31:14, 35:11, 35:13, 36:1 BEHALF [1] - 2:2 behave [1] - 8:20 behavior [1] - 27:15 behind [2] - 39:2, 43:4 beings [1] - 49:11 below [1] - 31:6 Beranek [3] - 2:7, 5:19, 5:21 BERANEK [2] - 3:10, 5:20 best [2] - 40:14, 40:15 better [6] - 6:16, 25:11, 34:21, 38:5, 38:16, 39:19 between [1] - 33:14 big [1] - 17:9 biggest [1] - 22:18 bill [1] - 28:2 Bill [4] - 2:7, 5:18, 5:20, 38:5		
2				
20 [2] - 38:4, 41:3 2010 [1] - 32:12 2015 [4] - 1:17, 3:1, 51:17, 52:7 2016 [1] - 52:15 21 [1] - 45:9 21st [1] - 37:20 23rd [2] - 4:17, 4:18 2405 [1] - 1:15 27 [1] - 52:15 28 [1] - 22:20				
3				
30 [1] - 23:18 31 [1] - 33:8 317 [1] - 1:23 35 [1] - 50:3 3500 [1] - 23:6				
4				
46032 [1] - 1:22				
6				
64,000 [1] - 42:7				
7				
7:10 [2] - 1:17, 3:1				
8				
8 [1] - 33:9 848-0088 [1] - 1:23 850 [1] - 22:17 8:08 [1] - 51:17				

C				
<p>cannot [1] - 41:20 cans [2] - 47:14, 48:12 capability [3] - 7:9, 30:14, 30:21 captioned [1] - 1:11 care [3] - 9:6, 9:7, 28:20, 29:12, 42:23, 50:7 Carmel [1] - 1:22 case [1] - 7:6 Catholic [1] - 35:11 caught [1] - 36:8 caused [1] - 6:23 causing [1] - 9:17 CDC [4] - 23:22, 24:1, 26:17 Census [1] - 31:3 center [3] - 16:6, 29:8, 32:8, 34:8, 43:15, 43:17, 50:17, 50:19 Center [1] - 33:5 certainly [1] - 5:16 CERTIFICATE [1] - 52:1 certify [1] - 52:5 chair [1] - 36:4 Chair [1] - 5:21 chance [3] - 13:10, 15:7, 51:7 change [4] - 11:9, 38:16, 39:18, 50:23 changes [2] - 13:2, 36:11 character [1] - 27:15 checking [1] - 30:19 chemical [2] - 9:2, 40:11 chemicals [2] - 8:20, 41:11 children [1] - 43:14 Christine [2] - 2:16, 50:16 Church [1] - 35:11 church [7] - 33:7, 34:4, 34:5, 36:1, 36:3, 36:6, 36:9 citations [1] - 8:15 citizens [3] - 6:6, 11:16, 14:18, 20:10, 28:8 City [2] - 44:8, 52:4 city [17] - 11:16, 12:22, 13:3, 19:1, 19:2, 19:5, 19:6, 24:16, 26:5, 29:10, 29:19, 37:22, 39:23, 40:4, 40:8, 40:14, 42:9</p>	<p>clamoring [1] - 38:13 clean [3] - 20:8, 43:22, 49:12 close [5] - 3:16, 19:12, 35:9, 40:7, 48:3 closed [1] - 51:14 closest [1] - 39:1 CM [1] - 1:21 collection [1] - 14:18 coming [3] - 16:9, 22:11, 32:18, 35:21, 41:22, 47:8, 48:13, 51:12 comment [5] - 4:3, 4:11, 4:13, 13:6 comments [14] - 4:1, 4:4, 4:9, 4:10, 4:16, 5:15, 6:15, 10:19, 15:21, 18:17, 22:7, 30:9, 46:22, 50:21 Commission [1] - 52:15 committee [4] - 5:22, 5:23, 6:3, 7:17 communication [2] - 22:13, 22:15 community [3] - 6:10, 23:23, 24:22 companies [3] - 11:20, 11:22, 41:19 company [7] - 7:2, 7:4, 8:2, 11:14, 11:21, 17:16, 46:1 comparable [1] - 49:6 compared [1] - 47:22 complaint [1] - 22:3 complaints [3] - 8:10, 9:21, 21:7 compliance [2] - 12:12, 18:12 comply [3] - 11:6, 12:7, 45:1 compromised [2] - 16:19, 17:1 computer [1] - 22:16 concern [4] - 6:9, 6:18, 16:10, 21:12 concerned [7] - 15:19, 17:3, 17:21, 20:18, 44:2, 44:14, 44:15 concerns [3] - 17:17, 42:16, 50:22 concluded [1] - 51:17 conclusion [3] - 38:11, 41:14, 41:23 Concord [9] - 24:1, 33:4, 34:8, 43:15, 43:17, 44:3, 50:16, 50:19 Concord's [1] - 44:3</p>	<p>conditioner [2] - 19:13, 27:23 conditioning [2] - 27:20, 27:21 confidence [1] - 14:20 consider [3] - 10:3, 27:5, 33:17 consideration [1] - 51:4 consistent [2] - 14:7, 23:11 constant [2] - 46:11, 47:7 constituents [3] - 20:19, 38:17, 42:14 contaminant [1] - 32:14 contaminants [2] - 23:8, 33:22 continually [1] - 47:19 continue [3] - 6:14, 29:19, 41:15 continues [1] - 42:20 controls [1] - 10:4 conversation [1] - 16:18 corporation [1] - 23:23 correct [1] - 52:6 correctly [1] - 31:3 counter [1] - 40:13 county [2] - 5:21, 6:1 County [3] - 1:14, 6:2, 6:18, 10:7, 52:4 couple [3] - 13:21, 35:2, 44:19 course [3] - 16:5, 34:7, 35:20 court [3] - 4:5, 5:16, 49:21 Court [1] - 52:3 crazy [1] - 28:1 create [1] - 9:1 creating [1] - 4:7 cross [1] - 38:18 crossed [1] - 39:6 crowd [3] - 25:14, 30:11, 42:22 Crystal [2] - 2:9, 21:8 crystal [2] - 18:19, 21:3</p>	<p>Daniels [1] - 1:21 Darrell [5] - 2:14, 42:4, 43:10, 43:12 date [1] - 31:22 daughters [1] - 20:15 Dave [1] - 13:19 David [3] - 2:8, 2:15, 10:17, 13:16, 43:11, 45:7 days [3] - 36:11, 45:17, 45:22 deadline [1] - 4:15 deal [1] - 8:8 dealing [1] - 48:6 death [1] - 39:14 decades [1] - 6:19 decided [1] - 41:6 deck [1] - 26:23 decline [1] - 27:7 declined [1] - 27:10 defending [1] - 31:10 definitely [1] - 37:4 delicatessen [1] - 22:20 demanding [1] - 43:2 demographic [1] - 19:10 denied [1] - 27:16 Denny [1] - 42:17 DEPARTMENT [1] - 1:1 department [3] - 3:4, 7:2, 7:4 Department [1] - 3:18 departments [3] - 6:4, 6:5 description [2] - 8:6 design [1] - 9:5 detect [1] - 7:21 determine [4] - 10:9, 13:1, 14:9, 14:19 develop [1] - 24:6 development [3] - 16:4, 23:20, 23:23, 24:5, 24:17, 24:20, 43:19, 43:20 died [1] - 28:9 different [3] - 35:3, 35:22, 35:23 difficult [5] - 9:22, 23:21, 34:6, 34:10, 35:14 diligently [1] - 19:6 direction [4] - 33:11, 35:22, 35:23, 36:12 directly [2] - 22:21, 35:5 disadvantaged [1] - 24:13</p>	<p>disappointed [2] - 14:4, 14:17 disheartening [1] - 39:16 district [5] - 37:18, 37:19, 39:23, 42:7, 42:11 disturbances [1] - 7:13 diverse [1] - 19:9 document [1] - 4:8 documentation [1] - 4:16 done [4] - 11:8, 11:11, 48:22, 49:9 door [5] - 22:18, 30:19, 42:14, 42:16, 45:8 doubt [1] - 9:23 Doug [4] - 1:12, 2:2, 3:3, 3:18 down [16] - 4:5, 4:14, 12:11, 13:7, 13:8, 13:9, 14:2, 17:10, 17:14, 22:22, 23:9, 37:20, 46:19, 47:19, 50:6 downtown [10] - 7:13, 18:13, 20:3, 26:1, 26:2, 29:20, 32:11, 39:1, 41:18, 42:8 DR [2] - 3:10, 5:20 drag [1] - 44:23 drive [3] - 13:8, 13:9, 22:22 driving [3] - 23:9, 23:10, 32:16 due [4] - 26:23, 27:7, 27:11, 27:22 dug [1] - 28:7 dumped [2] - 47:12, 47:14 dumping [2] - 47:9, 47:12 during [5] - 3:22, 4:10, 19:20, 21:16, 29:17</p>
		D		E
		<p>d/b/a [1] - 1:21 DALE [1] - 22:10 Dale [5] - 2:10, 21:4, 22:8, 22:9, 22:16 Dan [4] - 2:13, 34:16, 37:14, 37:17</p>		<p>e-mail [2] - 4:12, 4:18 e-mailing [1] - 32:13 Earth [1] - 35:8 east [3] - 30:17, 35:5, 37:21 easy [1] - 36:5 economic [2] - 16:4, 27:9 effect [1] - 34:1 effective [1] - 10:9 effluent [2] - 27:12,</p>

27:19 effort [1] - 41:9 eight [2] - 21:13, 22:22 eighty [1] - 17:12 either [1] - 4:11 elderly [1] - 33:5 electric [1] - 28:2 elementary [1] - 33:9 eloquently [2] - 18:21, 18:22 emanate [1] - 42:20 emanates [1] - 20:2 embarrassing [3] - 27:3, 35:18, 36:17 embarrassment [1] - 50:22 emergency [1] - 5:22 Emerson [1] - 32:10 emission [1] - 7:1 emissions [4] - 6:20, 11:23, 12:2, 29:23 emitter [1] - 19:21 Emmerich [1] - 1:14 encourage [6] - 6:13, 10:2, 25:19, 31:12, 40:5, 44:16 encouraged [1] - 36:21 ended [1] - 7:7 ends [1] - 36:10 energized [1] - 39:18 enforce [2] - 24:23, 36:23 enforcement [1] - 25:20 enjoy [1] - 13:22 enjoying [1] - 28:2 enjoyment [1] - 27:16 enrich [1] - 43:3 entity [1] - 24:4 environmental [2] - 14:8, 31:8 Environmental [2] - 3:5, 3:19 ENVIRONMENTAL [1] - 1:1 EPA [1] - 9:23 equipment [3] - 9:23, 10:1, 11:3 errors [1] - 23:2 especially [6] - 18:7, 23:9, 34:6, 34:9, 36:18, 38:23 essentially [1] - 37:20 Essex [5] - 2:8, 15:10, 15:14, 18:21 ESSEX [1] - 15:13 estate [1] - 47:7	evacuations [1] - 7:13 evening [9] - 13:18, 15:13, 26:14, 30:9, 31:1, 32:6, 35:16, 37:17, 40:17 event [1] - 22:12 exactly [2] - 13:11, 28:23 exchangers [1] - 29:23 excuse [2] - 28:16, 28:19 experience [3] - 7:1, 24:10, 37:8 expires [1] - 52:15 explain [1] - 25:12 explained [1] - 3:23 extremely [1] - 25:21 eyes [1] - 44:11	5:6, 11:18, 20:17, 28:3, 41:3, 44:22 five-year [1] - 11:18 floor [1] - 7:15 folks [4] - 4:2, 4:21, 24:13, 41:2 follow [1] - 17:9 force [2] - 32:22, 40:8 foregoing [1] - 52:5 Forestal [5] - 2:13, 34:16, 37:14, 37:15, 37:17 FORESTAL [1] - 37:16 formal [1] - 8:6 fortunately [1] - 35:22 forward [5] - 41:12, 41:22, 45:4, 51:4 Fountain [2] - 37:22, 40:1 four [5] - 6:19, 18:1, 20:13, 28:2, 36:16 four-year-old [1] - 36:16 frankly [1] - 39:22 free [2] - 46:19, 46:22 frequently [2] - 26:22, 27:23 friends [4] - 27:10, 27:17, 36:19, 42:13 front [3] - 28:7, 28:11, 45:17 frustrating [2] - 36:2, 36:12 funeral [2] - 35:4, 35:15 future [2] - 12:16, 16:1	grass [1] - 47:20 grassroots [1] - 38:12 great [6] - 6:9, 17:9, 24:21, 29:10, 29:19, 40:3, 40:4 group [2] - 19:3, 39:18 groups [1] - 31:19 grown [1] - 43:14 growth [1] - 18:9 guarantee [1] - 13:10 guess [2] - 25:8, 25:10 guests [2] - 27:1, 27:4 guys [8] - 10:21, 11:22, 11:23, 13:7, 21:6, 29:6, 43:7, 43:22	50:15 help [5] - 34:11, 39:8, 43:3, 43:22, 45:4 helping [1] - 25:12 Hendricks [1] - 42:18 hereby [1] - 52:5 Hi [1] - 28:16 hi [4] - 3:3, 10:18, 34:17, 45:7 High [2] - 1:15, 33:12 high [1] - 16:10 higher [2] - 40:20, 49:9 historic [2] - 44:6, 44:7 hold [2] - 40:19, 43:7 holding [2] - 6:8, 29:20 Holt [1] - 32:10 holy [1] - 38:18 home [8] - 16:23, 21:14, 23:10, 26:17, 35:4, 35:15, 36:13, 43:13 homeowner [1] - 21:10 homes [5] - 27:11, 27:12, 32:14, 35:6, 43:14 honor [1] - 32:8 hook [1] - 44:22 hope [9] - 23:11, 25:16, 35:20, 36:23, 37:4, 37:8, 38:10, 41:13, 45:3 hopeful [2] - 38:15, 41:8 hoping [1] - 37:3 hospitals [1] - 6:4 hot [1] - 19:11 hotels [1] - 18:10 hour [1] - 5:2 hours [1] - 21:16 house [7] - 26:18, 26:19, 27:6, 40:18, 42:7, 46:9 household [1] - 31:5 houses [1] - 31:15 housing [1] - 27:14 human [1] - 49:11 hunting [1] - 28:9 hurts [1] - 7:8 husband [1] - 17:22
H				
hand [1] - 4:14 HAP's [3] - 8:18, 9:3, 10:6 hard [4] - 12:6, 21:17, 30:22, 31:9 hazard [1] - 48:21 hazardous [1] - 6:1 headaches [1] - 21:19 headed [1] - 51:13 health [6] - 6:5, 16:19, 17:1, 44:16, 48:21, 50:21 Health [2] - 47:16, 48:6 hear [10] - 3:7, 3:12, 5:15, 5:17, 18:19, 26:11, 28:21, 31:21, 36:21, 39:3 heard [6] - 19:7, 28:22, 42:16, 50:20, 51:2, 51:6 HEARING [24] - 1:4, 3:3, 3:12, 3:17, 5:12, 10:15, 13:14, 15:2, 15:9, 18:16, 21:1, 22:6, 25:6, 26:9, 28:14, 30:5, 32:2, 34:15, 37:14, 42:3, 43:10, 46:17, 49:15, 51:11 hearing [11] - 3:11, 3:20, 3:22, 4:10, 5:9, 6:8, 15:17, 25:9, 30:9, 51:13, 51:14 Hearing [2] - 1:11, 2:2 heart [4] - 33:1, 33:7, 34:3, 35:10 heck [1] - 14:19 heed [1] - 40:23 held [1] - 41:10 hello [3] - 5:20, 43:12,	I			
IDEM [13] - 2:2, 6:7, 6:14, 7:14, 7:15, 9:13, 10:8, 11:19, 15:16, 19:1, 38:7,				

43:21, 45:2
IDEM's [2] - 8:1, 30:20
idiot [1] - 45:11
ignorance [1] - 14:10
ill [1] - 16:22
imagine [1] - 16:11
impacted [3] - 33:3, 38:19, 41:5
important [7] - 15:18, 25:15, 25:18, 25:21, 26:4, 28:22, 40:23
importantly [1] - 51:1
improvement [1] - 14:15
includes [2] - 4:17, 40:1
including [3] - 7:14, 37:22
income [1] - 31:4
incredible [1] - 45:17
INDIANA [2] - 1:1, 1:21
Indiana [10] - 1:14, 1:16, 1:22, 3:4, 3:18, 26:6, 37:19, 46:4, 52:4, 52:13
Indiana's [1] - 37:18
Indianapolis [11] - 1:16, 6:10, 15:23, 16:5, 24:18, 29:7, 38:22, 41:17, 42:8, 44:8, 46:3
indicated [1] - 4:21
indicative [2] - 25:15, 42:23
individuals [1] - 50:18
industrial [4] - 9:2, 13:2, 13:5, 43:23
industry [1] - 6:6
Indy [1] - 29:7
informed [1] - 16:20
infringing [1] - 31:11
initial [1] - 4:23
inside [2] - 14:3, 42:10
instantly [2] - 47:16, 47:17
instead [1] - 11:18
interesting [2] - 35:8, 45:14
international [1] - 46:1
invest [1] - 22:1
invested [1] - 47:1
Irvington [2] - 37:20, 40:1
issue [9] - 6:9, 11:4, 15:18, 17:2, 18:23, 19:16, 20:13, 20:21, 38:11
issues [1] - 8:3

issuing [2] - 8:17, 12:5
items [1] - 12:3
itself [2] - 30:20, 31:10
IUPUI [1] - 29:22

J

JACK [1] - 50:15
Jack [1] - 2:16
jack [1] - 50:16
James [9] - 2:9, 2:11, 15:11, 18:18, 26:12, 28:14
Janezic [1] - 35:12
Jeff [6] - 2:13, 13:17, 15:4, 32:5, 34:16, 34:17
Jenny [1] - 2:4
Jim [3] - 28:17, 47:3, 49:23
Jim's [1] - 47:10
jobs [1] - 40:7
join [2] - 40:19, 43:6
Jr [3] - 1:13, 52:2, 52:11
Judith [6] - 2:8, 15:10, 15:14, 18:21, 26:15
Julie [2] - 2:3, 22:12
justice [1] - 31:8
Justin [2] - 2:14, 42:6
justin [1] - 37:15

K

keep [2] - 5:6, 31:22
keeping [1] - 10:10
Kentucky [1] - 49:19
kids [3] - 20:13, 34:10, 44:2
kind [4] - 12:10, 24:7, 24:20, 39:10
kinds [3] - 26:3, 39:3, 47:9
knowing [3] - 18:8, 39:5, 39:15
known [1] - 22:19
knows [2] - 11:19, 14:21

L

LAFLIN [1] - 32:6
Lafin [4] - 2:12, 30:7, 32:4, 38:1
landlord [1] - 46:7
landlords [1] - 27:13
landmark [1] - 22:19
largest [1] - 26:5
Larry [1] - 35:11

last [4] - 13:6, 24:18, 28:5, 49:17
lastly [2] - 20:12, 24:14
Lauck [1] - 35:4
Laughter [2] - 28:4, 45:20
law [3] - 6:21, 12:10, 36:14
leaders [2] - 19:3, 40:18
leak [4] - 7:3, 7:11, 23:4, 28:10
leaks [1] - 7:19
learned [1] - 14:11
least [1] - 37:3
leave [1] - 36:11
left [1] - 23:1
legal [2] - 8:8, 48:23
legislator [1] - 38:21
LEPC [2] - 6:16, 10:7
letting [2] - 34:5
levels [1] - 33:21
liaison [1] - 32:7
library [1] - 33:13
life [12] - 17:21, 18:6, 18:23, 19:17, 20:21, 24:16, 34:2, 37:7, 38:19, 39:14, 40:12, 41:4
lift [1] - 25:1
lifted [1] - 24:22
lifting [1] - 24:15
Lilly's [1] - 29:22
limit [2] - 4:23, 5:8
limits [1] - 18:2
Lindy [3] - 1:12, 52:2, 52:11
line [1] - 30:19
liquid [1] - 47:14
Lisa [6] - 2:12, 30:6, 32:4, 38:1, 38:2, 38:5
list [1] - 9:3
listening [1] - 20:22
literally [2] - 39:14, 45:11
live [19] - 13:19, 17:23, 19:13, 19:15, 20:14, 22:21, 24:9, 29:6, 29:8, 32:9, 35:14, 39:22, 40:5, 41:19, 42:8, 45:8, 45:13, 46:12, 48:17
lived [2] - 26:15, 41:2
liver [1] - 16:19
lives [3] - 36:14, 43:3, 49:2
living [3] - 13:22, 30:16, 46:6

local [2] - 5:22, 48:4
location [1] - 24:11
Lockerbie [3] - 37:21, 38:17, 40:2
look [8] - 8:13, 12:23, 29:21, 41:11, 41:22, 42:13
looked [1] - 8:9
looking [5] - 9:9, 9:14, 10:7, 10:8, 46:10
loop [1] - 44:21
lost [1] - 7:21
Louisville [1] - 49:18
love [4] - 31:21, 31:22, 45:13, 51:7
loved [1] - 45:12
lovely [1] - 28:8
low [1] - 9:16
LUBRICANTS [1] - 1:6
Lubricants [4] - 40:20, 42:21, 47:2, 50:9
lubricants [5] - 3:21, 7:20, 16:9, 29:2, 33:1
Lucas [3] - 16:11, 18:11, 24:20

M

Madison [3] - 1:15, 32:23, 33:8
mail [5] - 4:12, 4:18, 4:19, 47:17
mailing [1] - 32:13
management [1] - 3:5
MANAGEMENT [1] - 1:1
Management [1] - 3:19
manual [1] - 33:12
Manual [1] - 1:14
Marion [5] - 5:21, 6:1, 6:2, 6:18, 10:7
marks [1] - 14:7
mask [1] - 48:2
material [1] - 29:16
materials [1] - 6:2
Matt [1] - 6:11
matter [6] - 1:11, 19:1, 31:7, 31:8, 38:7, 52:7
Matthew [1] - 2:3
mattresses [1] - 47:13
mayor [2] - 29:10, 29:11
Mayor's [2] - 19:20, 32:7
mean [6] - 7:8, 9:19, 12:17, 35:5, 47:17, 47:21

means [1] - 7:20
meant [1] - 28:18
measuring [1] - 9:18
meeting [7] - 3:23, 16:6, 16:21, 19:9, 31:2, 38:4, 39:6
meetings [1] - 38:6
MEMBER [6] - 3:7, 3:14, 34:19, 34:23, 37:11, 48:14
members [2] - 5:23, 41:15
mention [1] - 19:17
mentioned [2] - 19:8, 26:17
mercaptan [2] - 9:6, 9:8
mercaptans [4] - 8:22, 9:10, 9:15, 10:5
Meridian [4] - 13:8, 22:17, 22:23, 23:5
met [1] - 42:14
metal [1] - 47:2
Metalworking [1] - 40:19
metalworking [7] - 3:20, 7:20, 16:9, 29:2, 32:23, 42:21, 50:9
METALWORKING [1] - 1:6
Meyer [3] - 1:13, 52:2, 52:11
microphone [4] - 5:10, 5:11, 5:14, 34:19
midnight [1] - 21:16
midwest [1] - 22:16
might [4] - 7:6, 14:10, 20:19, 37:2
mile [1] - 24:19
miles [1] - 22:22
mimicked [1] - 6:21
mind [1] - 39:6
mine [2] - 16:18, 47:4
Mini [1] - 1:15
minute [2] - 47:21, 47:22
minutes [4] - 4:23, 5:2, 5:3, 5:6
miserable [1] - 37:7
mitigate [1] - 34:12
mobilized [1] - 39:18
modern [1] - 26:19
Moed [5] - 2:14, 37:15, 41:16, 42:3, 42:6
MOED [1] - 42:5
Monday [3] - 1:16, 4:17, 52:7
money [2] - 24:6, 28:1

monitoring [6] - 8:11, 9:10, 9:13, 12:19, 37:5
 morning [1] - 31:4
 mornings [1] - 34:4
 Morris [1] - 13:9
 most [8] - 19:3, 22:18, 24:12, 29:7, 33:2, 44:7, 45:16, 51:1
 mostly [1] - 45:15
 mother [1] - 36:14
 mother-in-law [1] - 36:14
 move [3] - 14:4, 40:7, 51:4
 moved [2] - 49:19, 50:2
 moving [1] - 23:7
 mowing [2] - 47:19, 47:23
 MR [31] - 3:8, 3:15, 5:10, 10:12, 10:14, 10:18, 13:18, 14:23, 15:6, 15:12, 18:20, 22:10, 25:8, 28:16, 30:8, 34:17, 34:20, 34:22, 35:1, 37:12, 37:16, 43:12, 45:7, 45:21, 46:23, 48:16, 49:17, 49:20, 49:23, 50:1, 50:2
 MS [6] - 15:13, 21:5, 26:14, 28:5, 32:6, 50:15

N

name [11] - 13:18, 15:13, 21:8, 26:14, 34:17, 37:17, 42:5, 46:20, 46:23, 49:21, 50:15
 name's [2] - 5:20, 10:18
 Napoleon [1] - 14:2
 nasty [1] - 36:6
 national [1] - 31:6
 natural [1] - 6:22
 nature [1] - 48:23
 nauseated [1] - 21:20
 nauseates [1] - 40:9
 nauseating [2] - 26:23, 27:1
 near [5] - 25:22, 41:18, 42:8, 43:15, 48:12
 nearby [1] - 31:11
 necessarily [1] - 50:9
 need [6] - 5:12, 29:9, 29:15, 33:22, 45:4,

49:8
 needed [1] - 10:1
 needs [3] - 12:23, 18:12, 46:14
 neighbor [6] - 16:18, 17:6, 17:19, 18:13, 39:20, 50:12
 neighborhood [43] - 7:18, 13:22, 15:15, 15:22, 17:7, 17:16, 18:8, 19:3, 21:9, 22:19, 23:16, 23:17, 23:20, 24:5, 24:7, 24:15, 25:2, 26:16, 27:11, 27:17, 30:15, 31:4, 31:20, 32:7, 32:22, 33:2, 33:4, 33:6, 36:3, 37:21, 42:19, 43:19, 45:9, 45:12, 47:6, 47:9, 47:23, 48:8, 48:17, 48:18, 49:10, 50:17, 50:19
 neighborhoods [8] - 32:19, 33:10, 33:14, 38:17, 40:6, 40:15, 41:18, 42:17
 neighbors [10] - 25:22, 28:7, 31:11, 31:21, 32:9, 40:21, 42:13, 47:6, 48:4, 48:7
 never [2] - 19:7, 23:2
 new [9] - 11:4, 17:22, 24:23, 25:1, 25:20, 26:18, 36:21, 44:1, 44:17

news [1] - 30:19
 next [15] - 4:17, 10:16, 13:16, 15:4, 18:18, 21:3, 22:8, 22:18, 25:6, 26:11, 30:19, 32:4, 34:15, 45:8, 47:4
 next-door [1] - 30:19
 nieces [1] - 36:15
 night [3] - 19:16, 27:6, 50:21
 nights [1] - 28:3
 NO [1] - 1:5
 nobody [1] - 24:6
 nominated [1] - 6:1
 nonanswers [1] - 20:19
 noncompliance [1] - 12:20
 nonsmelly [1] - 20:8
 north [3] - 23:7, 50:4, 50:6
 northeast [1] - 17:23

Notary [3] - 1:13, 52:3, 52:12
 note [1] - 20:12
 notes [1] - 19:7
 notice [1] - 45:16
 nowhere [2] - 30:18, 48:12
 nuisance [2] - 29:14, 30:2
 number [1] - 14:5

O

o'clock [3] - 1:17, 3:1, 51:17
 obviously [2] - 25:18, 25:21
 occasions [1] - 27:2
 occur [2] - 7:11, 19:12
 occurred [1] - 39:9
 October [1] - 52:15
 odd [1] - 38:11
 odor [31] - 8:5, 8:8, 8:9, 8:11, 8:14, 9:16, 9:21, 16:13, 19:4, 19:16, 20:2, 20:10, 21:13, 21:18, 25:23, 26:20, 26:23, 27:8, 34:8, 35:19, 39:4, 39:11, 40:9, 40:11, 41:3, 41:10, 45:14, 45:23, 46:9, 46:11, 50:4
 odorant [1] - 6:21
 odors [5] - 10:10, 19:11, 20:18, 20:20, 28:6, 33:22
 OF [3] - 1:1, 1:21, 2:2
 offending [1] - 27:4
 office [1] - 19:20
 Officer [2] - 1:12, 2:2
 OFFICER [23] - 3:3, 3:12, 3:17, 5:12, 10:15, 13:14, 15:2, 15:9, 18:16, 21:1, 22:6, 25:6, 26:9, 28:14, 30:5, 32:2, 34:15, 37:14, 42:3, 43:10, 46:17, 49:15, 51:11
 officials [2] - 38:7
 often [2] - 35:23, 44:9
 Ohio [1] - 39:1
 oil [2] - 18:11, 24:21
 Oil [1] - 16:11
 old [7] - 15:14, 23:16, 29:21, 32:21, 36:16, 42:17, 45:11
 older [2] - 36:3
 oldest [1] - 21:22

OLSON [1] - 30:8
 Olson [5] - 2:12, 28:15, 30:6, 32:3
 ON [1] - 2:2
 on-line [1] - 30:19
 one [22] - 12:13, 13:6, 14:5, 16:3, 16:7, 19:8, 21:22, 27:18, 28:5, 28:7, 28:8, 30:10, 35:6, 38:19, 39:1, 41:5, 46:5, 46:8, 48:4, 49:17, 49:21
 ones [2] - 9:15, 9:16
 open [1] - 16:12
 operate [2] - 19:21, 50:11
 operating [5] - 10:21, 11:3, 11:20, 12:7, 12:9
 opportunities [1] - 44:1
 opportunity [3] - 4:2, 5:5, 21:6
 optimistic [1] - 38:15
 order [1] - 11:4
 ordinance [1] - 12:10
 organizations [1] - 8:1
 organosulphydryls [1] - 8:21
 originally [2] - 49:18, 50:2
 ought [1] - 7:10
 outside [7] - 16:22, 18:2, 34:10, 39:7, 39:10, 44:4, 47:8
 overpowering [1] - 34:7
 oversee [1] - 6:1
 own [6] - 14:9, 14:19, 22:16, 35:4, 36:13, 43:13
 owner [1] - 35:4
 owns [1] - 47:3
 ozone [1] - 9:1

P

p.m. [3] - 1:17, 3:1, 51:17
 pains [1] - 21:21
 paper [2] - 11:2, 48:11
 Pardue [2] - 2:15, 47:1
 PARDUE [2] - 46:23, 48:16
 Park [1] - 33:12
 park [7] - 33:13, 42:12, 42:19, 43:14, 44:5, 44:7, 44:10
 parked [1] - 39:7

PARSLEY [1] - 10:18
 Parsley [5] - 2:7, 10:16, 10:17, 10:19, 13:15
 part [4] - 12:16, 15:23, 32:7, 38:5
 participation [1] - 38:13
 particular [1] - 39:23
 particularly [1] - 19:10
 partner [2] - 27:1, 27:22
 partnerships [2] - 43:21, 45:2
 past [6] - 6:19, 11:8, 12:20, 13:3, 43:18, 45:3
 past-president [1] - 43:18
 path [1] - 20:10
 Patty [1] - 2:4
 pay [3] - 8:20, 9:5, 47:18
 paying [1] - 36:5
 Pear [1] - 2:4
 Pence [1] - 29:12
 penetrates [1] - 21:14
 people [42] - 6:23, 7:10, 7:18, 7:21, 7:23, 18:4, 19:12, 19:14, 19:19, 19:23, 26:2, 27:6, 27:10, 28:20, 28:22, 30:12, 30:16, 30:23, 31:1, 31:15, 33:23, 35:21, 36:5, 38:4, 38:13, 39:4, 39:17, 40:5, 40:9, 42:7, 42:23, 43:4, 45:10, 47:8, 48:1, 48:6, 48:17, 48:18, 49:5, 49:6, 49:10
 people's [2] - 40:12, 51:6
 per [2] - 4:23, 31:5
 perhaps [1] - 20:1
 period [3] - 11:13, 12:11, 19:20
 periodically [1] - 6:19
 permeates [3] - 16:23, 20:3, 26:21
 PERMIT [1] - 1:5
 permit [28] - 3:21, 6:11, 6:12, 8:6, 8:7, 8:17, 10:3, 10:22, 11:5, 11:6, 11:17, 11:18, 12:4, 12:5, 12:8, 12:9, 12:17, 14:12, 25:20, 33:17, 33:20, 36:22, 37:5,

<p>41:9, 44:17, 44:20 permits [2] - 23:12, 24:23 permitted [1] - 11:1 permitting [2] - 25:17, 29:4 person [3] - 5:18, 19:6, 46:8 personal [1] - 20:12 phantom [2] - 28:6, 28:10 picked [1] - 33:22 piece [1] - 12:23 place [3] - 24:1, 24:17, 40:1, 40:4, 41:9, 49:5 places [2] - 40:15, 41:19 plan [3] - 16:6, 24:17, 24:18 planning [2] - 5:22, 16:1 plant [5] - 30:17, 35:5, 35:7, 48:3, 48:13 play [1] - 41:7 playing [1] - 34:10 plays [1] - 41:7 pleasant [2] - 28:3, 32:20 podium [1] - 5:13 point [3] - 8:4, 8:5, 11:7 police [1] - 6:4 policy [1] - 30:2 pollute [1] - 41:20 pollution [2] - 48:10 poor [2] - 14:6, 30:15 population [1] - 31:9 porch [2] - 26:23, 45:17 portion [1] - 3:22 position [1] - 38:11 possible [3] - 37:6, 37:9, 44:17 possibly [1] - 37:6 posted [1] - 17:8 postmarked [1] - 4:20 pounds [2] - 17:12, 17:14 POWELL [1] - 13:18 Powell [5] - 2:8, 10:17, 13:16, 13:19, 15:3 practical [1] - 10:9 practice [1] - 17:5 practices [2] - 17:18, 31:10 pray [1] - 35:21 prepare [1] - 4:6 prepared [1] - 13:20</p>	<p>PRESENT [1] - 2:6 president [2] - 15:14, 43:18 pretty [2] - 19:9, 28:10 prevailed [1] - 19:21 privilege [1] - 32:9 probationary [2] - 11:17, 44:20 problem [3] - 9:17, 10:3, 29:12, 42:15, 42:20, 43:1, 47:7, 47:10 problems [1] - 37:3 proceedings [2] - 51:16, 52:6 PROCEEDINGS [1] - 1:10 process [7] - 14:12, 16:1, 25:11, 25:18, 29:4, 44:23, 51:5 professionals [1] - 40:6 program [1] - 8:1 programs [2] - 43:16, 44:3 promote [1] - 16:4 propane [1] - 6:22 proper [1] - 48:20 properties [1] - 48:6 property [7] - 12:23, 13:2, 13:4, 27:16, 47:1, 47:4, 47:10 prospect [1] - 32:20 provide [2] - 20:8, 27:13 provisions [1] - 44:20 public [14] - 3:20, 3:22, 3:23, 4:10, 5:9, 5:15, 6:5, 6:8, 7:8, 7:9, 8:3, 8:6, 15:17, 51:13 PUBLIC [1] - 1:4 Public [3] - 1:13, 52:3, 52:12 pungent [1] - 50:4 put [10] - 6:16, 6:22, 10:4, 12:3, 37:9, 40:8, 41:11, 44:4, 44:17, 48:2 putting [3] - 12:2, 22:12, 33:19</p>	<p>questionable [1] - 27:14 questions [2] - 4:4, 5:16 quite [1] - 35:23</p> <p>R</p> <p>raise [1] - 40:7 rampant [1] - 29:3 rather [1] - 28:2 ready [2] - 10:8, 40:17 real [6] - 7:11, 17:1, 21:13, 24:20, 47:7, 50:4 realize [1] - 25:9 really [30] - 13:20, 13:21, 14:2, 14:13, 14:21, 16:3, 16:22, 17:4, 17:17, 18:1, 18:6, 22:13, 23:1, 23:19, 25:1, 27:4, 29:5, 30:17, 31:7, 31:16, 33:16, 34:6, 34:9, 34:18, 35:2, 35:8, 35:17, 47:5, 47:21 reason [3] - 14:5, 19:23, 29:18 receive [1] - 4:9 recently [1] - 24:2 record [3] - 4:3, 6:17, 49:3 records [1] - 29:22 recreate [1] - 43:23 redevelopment [1] - 43:20 reduce [2] - 8:2, 10:9 refinery [1] - 50:5 reflection [1] - 20:6 refuses [1] - 38:19 REGARDING [1] - 1:4 regardless [2] - 40:10, 41:4 region [1] - 24:19 regional [1] - 16:5 regular [2] - 4:12, 9:12 regularly [1] - 7:7 regulations [1] - 49:5 rehabbed [1] - 26:17 relate [1] - 19:1 related [1] - 25:20 relationship [1] - 28:19 relatively [1] - 17:22 release [1] - 7:15 remember [3] - 10:21, 26:4, 50:3 rent [1] - 46:9 renters [1] - 27:14</p>	<p>REP [1] - 42:5 Rep [4] - 2:13, 2:14, 41:16, 42:3 report [3] - 7:19, 23:3, 28:6 reporter [3] - 4:5, 5:17, 49:22 Reporter [1] - 52:3 REPORTING [1] - 1:21 represent [3] - 32:9, 37:18, 50:18 representative [1] - 42:6 representatives [2] - 6:3, 49:8 represented [1] - 41:1 representing [1] - 35:2 represents [1] - 38:10 request [2] - 7:5, 8:1 requesting [1] - 43:2 required [1] - 6:21 requirements [3] - 11:10, 33:18, 33:20 requires [1] - 9:22 reserve [1] - 15:7 resident [1] - 42:12 residents [2] - 25:2, 32:12 resides [1] - 42:10 residing [1] - 52:3 respirator [2] - 21:23, 22:1 respond [1] - 7:5 response [2] - 6:2, 7:8 responses [1] - 4:1 responsible [1] - 41:10 restaurants [1] - 18:10 restriction [1] - 17:14 restrictions [1] - 17:8 result [1] - 22:14 Richard [2] - 2:15, 46:23 river [1] - 32:22 road [1] - 13:7 Road [1] - 32:10 rock [1] - 36:19 Rolls [1] - 45:9 Rolls-Royce [1] - 45:9 roof [1] - 16:12 room [5] - 5:14, 38:1, 41:1, 42:13, 49:2 ROSELEE [2] - 26:14, 28:5 Roselee [4] - 2:11, 25:7, 26:11, 26:15 route [1] - 17:15 row [1] - 35:6</p>	<p>Royce [1] - 45:9 RPR/CP [1] - 1:21 rule [1] - 12:22 rules [1] - 41:7 run [7] - 27:23, 29:3, 32:20, 37:1, 39:2, 39:11, 50:9 running [1] - 22:21 runs [2] - 39:3, 40:13</p> <p>S</p> <p>sacred [3] - 33:7, 34:3, 35:10 safety [2] - 7:9, 8:3 samples [1] - 9:21 Saturday [1] - 27:6 saw [1] - 39:10 scene [1] - 39:10 school [4] - 33:8, 33:9, 43:16, 44:3 School [2] - 1:15, 33:12 scientific [1] - 9:9 scrubber [6] - 9:5, 12:13, 33:18, 33:19, 33:21, 37:1 sealed [1] - 26:19 second [2] - 6:10, 31:2 section [1] - 9:14 see [10] - 9:19, 12:1, 22:14, 23:13, 29:4, 29:11, 29:22, 39:17, 42:13, 51:13 seek [2] - 43:1, 43:4 seeps [1] - 32:14 send [3] - 4:18, 4:19, 11:23 sensitive [1] - 18:5 sent [1] - 43:4 serious [2] - 8:3, 39:14 seriously [1] - 31:13 serve [2] - 42:7, 43:3 serves [2] - 33:5, 33:9 services [1] - 6:5 set [1] - 4:8 seven [1] - 20:14 several [1] - 27:2 Shadeland [1] - 37:20 Shapiro's [2] - 22:20, 45:19 sheets [1] - 46:18 Shelby [2] - 1:14, 52:4 Shelbyville [1] - 52:4 shift [1] - 31:2 shorter [1] - 11:13 show [2] - 11:6, 11:15 showed [1] - 17:5</p>
---	--	--	---	---

<p>shut [2] - 12:11, 50:6</p> <p>shutdown [1] - 29:17</p> <p>side [13] - 15:15, 20:4, 21:9, 21:11, 23:16, 25:22, 26:1, 32:21, 42:9, 42:18, 45:12, 50:4, 50:6</p> <p>signed [2] - 5:18, 25:8</p> <p>significant [2] - 19:17, 48:21</p> <p>Simmons [4] - 2:9, 15:11, 18:18, 21:2</p> <p>SIMMONS [1] - 18:20</p> <p>simple [1] - 49:1</p> <p>sincerely [1] - 38:10</p> <p>sit [3] - 3:9, 26:22, 45:18</p> <p>site [1] - 30:20</p> <p>sites [1] - 30:20</p> <p>sits [1] - 33:1</p> <p>six [1] - 47:2</p> <p>sizable [1] - 30:11</p> <p>sleeping [1] - 21:17</p> <p>small [2] - 36:15, 48:8</p> <p>smell [13] - 18:5, 25:23, 27:19, 27:21, 29:16, 32:13, 32:17, 36:6, 36:7, 39:3, 39:4, 41:21, 50:7</p> <p>smelling [1] - 34:1</p> <p>SO2 [2] - 8:18, 10:5</p> <p>socially [1] - 24:12</p> <p>sold [1] - 27:13</p> <p>solution [2] - 38:14, 43:1</p> <p>solve [1] - 37:2</p> <p>sometimes [5] - 21:15, 34:4, 34:8, 36:5, 36:9</p> <p>somewhere [1] - 14:5</p> <p>sons [1] - 21:22</p> <p>soon [1] - 16:7</p> <p>sophisticated [2] - 9:11, 9:22</p> <p>sorry [3] - 46:11, 48:1, 49:20</p> <p>sort [2] - 14:8, 14:9</p> <p>sounds [3] - 14:12, 14:14, 23:12</p> <p>South [1] - 1:15</p> <p>south [15] - 15:14, 20:4, 21:9, 22:17, 22:22, 23:6, 23:16, 25:22, 26:1, 32:7, 32:21, 42:8, 42:17, 42:19, 45:12</p> <p>southeast [1] - 43:18</p> <p>southwest [2] - 15:23, 21:11</p> <p>speaker [12] - 4:23, 5:3, 10:16, 13:16, 15:4, 18:18, 21:3, 22:8, 25:7, 32:4, 34:16, 46:18</p> <p>SPEAKERS [1] - 2:6</p> <p>speakers [3] - 5:1, 5:4, 51:13</p> <p>speaking [1] - 7:23</p> <p>specifically [3] - 8:23, 9:1, 9:2</p> <p>speech [1] - 13:20</p> <p>spend [2] - 18:2, 24:6</p> <p>spoken [2] - 29:14, 46:21</p> <p>square [3] - 24:19, 37:22, 40:2</p> <p>St [1] - 36:19</p> <p>stadium [3] - 16:12, 18:11, 23:17</p> <p>Stadium [1] - 42:18</p> <p>stand [3] - 10:8, 40:17, 43:5</p> <p>standard [2] - 40:20</p> <p>standards [1] - 25:1</p> <p>standing [1] - 37:23</p> <p>start [3] - 3:6, 3:20, 14:1</p> <p>started [1] - 47:5</p> <p>starting [1] - 23:4</p> <p>starts [1] - 32:22</p> <p>State [4] - 1:13, 26:6, 46:4, 52:13</p> <p>state [11] - 5:23, 11:20, 12:23, 14:6, 28:19, 28:20, 38:7, 42:6, 46:20, 49:8, 49:21</p> <p>statehouse [3] - 39:2, 39:8, 43:5</p> <p>station [2] - 17:11, 38:23</p> <p>statutory [2] - 8:13, 8:16</p> <p>stay [1] - 41:18</p> <p>staying [1] - 29:11</p> <p>stemenick [1] - 13:17</p> <p>Stemenick [1] - 15:4</p> <p>Stemerick [1] - 15:5</p> <p>STEMERICK [1] - 15:6</p> <p>stench [3] - 23:8, 27:3, 44:12</p> <p>still [3] - 13:1, 26:20, 27:20</p> <p>stinks [2] - 14:3, 44:10</p> <p>stop [1] - 48:23</p> <p>story [2] - 11:9, 12:9</p> <p>straight [1] - 33:4</p> <p>street [4] - 13:8, 17:13, 36:13, 46:2</p> <p>Street [2] - 22:23, 39:1</p>	<p>strengthen [1] - 25:19</p> <p>strict [2] - 11:12, 12:19</p> <p>strikes [2] - 20:5, 20:7</p> <p>strong [2] - 21:13, 23:13</p> <p>stronger [2] - 11:10, 16:16</p> <p>strongest [1] - 44:17</p> <p>strongly [1] - 6:13</p> <p>struggled [1] - 24:4</p> <p>Stuckey [2] - 2:3, 6:11</p> <p>STUCKEY [10] - 3:8, 3:15, 5:10, 10:12, 10:14, 14:23, 15:12, 34:22, 49:20, 50:1</p> <p>stuff [1] - 10:20</p> <p>submitting [1] - 4:15</p> <p>subsequently [1] - 27:13</p> <p>substandard [1] - 27:14</p> <p>sum [1] - 29:6</p> <p>summer [2] - 34:7, 34:9</p> <p>summertime [5] - 19:11, 20:13, 20:16, 20:20, 44:9</p> <p>Sumner [2] - 23:4, 23:5</p> <p>Sunday [1] - 34:4</p> <p>Super [4] - 19:20, 19:22, 20:9, 29:17</p> <p>superior [1] - 6:12</p> <p>support [1] - 41:8</p> <p>supporting [1] - 4:16</p> <p>supposed [1] - 10:22</p> <p>surrounding [1] - 41:18</p> <p>system [2] - 12:13, 28:18</p>	<p>28:14, 30:5, 32:2, 34:15, 37:14, 42:3, 43:10, 46:17, 49:15, 51:11</p> <p>therefore [2] - 7:6, 8:17</p> <p>Thereupon [1] - 51:16</p> <p>they've [4] - 32:16, 37:7, 47:12, 47:14</p> <p>thinking [2] - 7:3, 9:12</p> <p>thousand [1] - 17:12</p> <p>three [3] - 6:19, 20:13, 36:14</p> <p>thresholds [1] - 9:16</p> <p>throughout [1] - 50:20</p> <p>throw [1] - 44:22</p> <p>tiny [1] - 28:11</p> <p>today [3] - 4:14, 34:13, 41:17</p> <p>together [1] - 19:2</p> <p>Tom [7] - 2:10, 2:10, 21:4, 22:8, 22:9, 22:16, 25:7</p> <p>tonight [12] - 14:11, 15:17, 22:11, 30:12, 32:21, 33:16, 39:6, 42:22, 44:19, 50:17, 51:3, 51:7</p> <p>tonight's [1] - 51:12</p> <p>took [1] - 19:6</p> <p>totally [1] - 46:6</p> <p>tougher [1] - 25:17</p> <p>toughest [1] - 37:9</p> <p>tourists [2] - 26:3, 45:19</p> <p>town [2] - 20:14, 21:11</p> <p>Township [1] - 29:8</p> <p>township [1] - 32:8</p> <p>tractor [1] - 48:1</p> <p>transcribed [1] - 52:8</p> <p>transcript [2] - 4:6, 52:6</p> <p>transplant [1] - 16:20</p> <p>trash [5] - 47:9, 47:11, 48:8, 48:11, 49:1</p> <p>trashed [1] - 28:10</p> <p>treasurer [2] - 35:10, 36:4</p> <p>tried [1] - 23:19</p> <p>troy [1] - 32:11</p> <p>truck [4] - 17:10, 17:11, 39:7, 39:12</p> <p>trucks [1] - 17:6</p> <p>true [1] - 52:5</p> <p>try [2] - 10:3, 32:15</p> <p>trying [7] - 9:21, 15:22, 16:4, 18:7, 24:17, 40:14, 46:5</p> <p>turn [2] - 14:3, 19:12</p> <p>twins [1] - 36:16</p>	<p>two [7] - 11:17, 14:11, 20:15, 21:22, 27:10, 36:16, 38:5</p> <p>types [1] - 9:23</p>
U			
<p>U.S [1] - 4:12</p> <p>uncomfortable [1] - 22:3</p> <p>under [6] - 10:22, 12:22, 29:14, 30:1, 41:2, 41:9</p> <p>undersigned [1] - 52:2</p> <p>unfair [1] - 20:7</p> <p>unfortunate [1] - 20:7</p> <p>Union [1] - 36:13</p> <p>unknown [1] - 32:13</p> <p>unless [1] - 30:18</p> <p>unpermitted [1] - 11:3</p> <p>unpleasant [1] - 40:10</p> <p>Unsworth [5] - 2:14, 42:4, 43:11, 43:13</p> <p>UNSWORTH [1] - 43:12</p> <p>up [24] - 5:13, 5:18, 7:7, 13:8, 13:9, 14:18, 22:22, 23:18, 24:15, 24:22, 25:1, 25:8, 26:18, 28:8, 29:6, 31:22, 33:23, 36:10, 40:8, 43:6, 43:23, 49:19, 50:3, 50:5</p> <p>updates [1] - 30:19</p> <p>upwind [1] - 17:23</p> <p>urban [1] - 43:19</p>			
V			
<p>value [1] - 27:16</p> <p>vast [1] - 14:15</p> <p>VELDHOF [4] - 34:17, 34:20, 35:1, 37:12</p> <p>Veldhof [5] - 2:13, 32:5, 34:16, 34:18, 35:4</p> <p>Village [2] - 42:18, 42:19</p> <p>village [1] - 23:18</p> <p>violating [1] - 49:1</p> <p>violation [3] - 12:4, 47:21, 48:10</p> <p>visibility [2] - 46:3, 46:4</p> <p>visitors [3] - 20:9, 26:3, 29:16</p> <p>VOC [1] - 10:5</p> <p>VOC's [1] - 8:18</p>			

voice [1] - 50:18 voices [2] - 51:2, 51:6 volatile [1] - 48:12	year [4] - 11:17, 11:18, 31:5, 36:16 years [15] - 7:14, 13:4, 18:23, 21:13, 22:21, 24:2, 26:16, 29:3, 38:4, 38:6, 41:3, 43:21, 44:22, 45:10, 50:3 young [1] - 40:6 youth [1] - 33:5
W	Z
Wagner [4] - 1:12, 2:2, 3:4, 3:18 waiting [1] - 39:11 walk [6] - 13:22, 14:2, 31:1, 32:15, 44:9, 45:19 walking [1] - 39:9 wants [4] - 11:14, 24:6, 36:18, 46:21 ways [1] - 27:9 weather's [1] - 28:3 Web [2] - 30:20 weeds [1] - 47:20 week [1] - 19:21 weekends [4] - 16:14, 16:15, 45:15, 45:18 weigh [1] - 17:11 weighed [1] - 17:12 weight [2] - 17:7, 17:14 well-known [1] - 22:19 west [2] - 33:3, 42:9 whole [1] - 25:11 wife [1] - 43:13 William [1] - 1:21 wind [5] - 33:3, 33:11, 33:14, 36:9, 36:11 wind's [1] - 35:21 window [1] - 28:1 window's [1] - 23:9 windows [2] - 19:12, 26:20 wisdom [1] - 41:1 wise [1] - 9:7 wishes [1] - 49:16 wonderful [3] - 36:22, 40:1, 41:19 wondering [1] - 50:22 woods [1] - 35:7 works [1] - 6:6 worries [1] - 7:17 worry [1] - 7:17 worse [1] - 16:14 worst [1] - 7:16 write [2] - 4:13, 44:16 writing [4] - 4:11, 6:16, 8:15, 33:17 written [3] - 4:6, 4:8, 4:16 wrongly [1] - 20:1	zoned [2] - 13:1, 13:4
Y	
yard [2] - 28:7, 28:11	

Code Key	
A	In 40 CFR 63, Subpart DD Table 1, but not a HAP
B	Not a HAP, but in 40 CFR 63, Subpart DD Table 1
C	Chemical was found in the outgoing but not in the incoming
Sample Result above the detect limit	

Table IDs		From 40 CFR 63, Subpart DD Table 1		Chemical	Sludge (ug/kg)	Wastewater (ug/L)	Soil (ug/kg)	Oil and Kiln (mg/kg)	IDEM Research			Incoming HAPs as tested		Outgoing HAPs as tested		
ID	Code	CAS No.	40 CFR 63, Subpart DD						CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products (ug/kg)	Wastewater (DL set to 0) (ug/L)	Soil (DL set to 0) (ug/kg)	Oil (DL set to 0)
fw 305										Yes/No						
1	B			Acetone	16,400	31,600	< 5000	144	67-64-1	no	exempt	--	--	--	--	--
2		107-02-8	1.000	Acrolein	< 5000	< 1000	< 5000	< 20	107-02-8	yes	yes	0.00	0.00	0.00	0.00	0.00
3		107-13-1	0.999	Acrylonitrile	< 5000	< 1000	< 5000	< 20	107-13-1	yes	yes	0.00	0.00	0.00	0.00	0.00
4		71-43-2	1.000	Benzene	1,290	< 5	347	< 1	71-43-2	yes	yes	1,290	1,290	0.00	346.50	0.00
5	B			Bromobenzene	< 250	< 50	< 250	< 1	108-86-1	no	yes	--	--	--	--	--
6	B			Bromochloromethane	< 250	< 50	< 250	< 1	74-97-5	no	yes	--	--	--	--	--
7	A		0.998	Bromodichloromethane	< 250	< 50	< 250	< 1	75-27-4	no	yes	0.00	0.00	0.00	0.00	0.00
8		75-25-2	0.998	Bromoform	< 250	< 50	< 250	< 1	75-25-2	yes	yes	0.00	0.00	0.00	0.00	0.00
9		74-83-9	1.000	Bromomethane (Methyl bromide)	< 250	< 50	< 250	< 1	74-83-9	yes	yes	0.00	0.00	0.00	0.00	0.00
10	B			n-Butanol	< 2500	< 500	< 2500	< 10	71-36-3	no	yes	--	--	--	--	--
11	A	78-93-3	0.99	2-Butanone (MEK)	< 500	< 100	< 500	< 2	78-93-3	no	yes	0.00	0.00	0.00	0.00	0.00
12	B			n-Butylbenzene	688	< 50	405	2	104-51-8	no	yes	--	--	--	--	--
13	B			sec-Butylbenzene	611	< 50	261	2	135-98-8	no	yes	--	--	--	--	--
14	B			tert-Butylbenzene	< 250	< 50	< 250	< 1	98-06-6	no	yes	--	--	--	--	--
15		75-15-0	1.000	Carbon Disulfide	< 250	< 50	< 250	< 1	75-15-0	yes	yes	0.00	0.00	0.00	0.00	0.00
16		56-23-5	1.000	Carbon Tetrachloride	< 250	< 50	< 250	< 1	56-23-5	yes	yes	0.00	0.00	0.00	0.00	0.00
17		108-90-7	1.000	Chlorobenzene	< 250	< 50	< 250	< 1	108-90-7	yes	yes	0.00	0.00	0.00	0.00	0.00
18		75-00-3	1.000	Chloroethane (Ethyl Chloride)	< 250	< 50	< 250	< 1	75-00-3	yes	yes	0.00	0.00	0.00	0.00	0.00
19	B			2-Chloroethylvinylether	< 2500	< 500	< 2500	< 10	110-75-8	no	yes	--	--	--	--	--
20	C	67-66-3	1.000	Chloroform	< 250	148	< 250	< 1	67-66-3	yes	yes	0.00	250	148.00	0.00	0.00
21		74-87-3	1.000	Chloromethane (methyl chloride)	< 250	< 50	< 250	< 1	74-87-3	yes	yes	0.00	0.00	0.00	0.00	0.00
22	B			2-Chlorotoluene	< 250	< 50	< 250	< 1	95-49-8	no	yes	--	--	--	--	--
23	B			4-Chlorotoluene	< 250	< 50	< 250	< 1	106-43-4	no	yes	--	--	--	--	--
24		96-12-8	1.000	1,2-Dibromo-3-chloropropane	< 250	< 50	< 250	< 1	96-12-8	yes	yes	0.00	0.00	0.00	0.00	0.00
25	B			Dibromochloromethane	< 250	< 50	< 250	< 1	124-48-1	no	yes	--	--	--	--	--
26			0.999	1,2-Dibromoethane (EDB)	< 250	< 50	< 250	< 1	106-93-4	yes	yes	0.00	0.00	0.00	0.00	0.00
27	B			Dibromomethane	< 250	< 50	< 250	< 1	74-95-3	no	yes	--	--	--	--	--
28	B			1,2-Dichlorobenzene	< 250	< 50	< 250	< 1	95-50-1	no	yes	--	--	--	--	--
29	B			1,3-Dichlorobenzene	< 250	< 50	< 250	< 1	541-73-1	no	yes	--	--	--	--	--
30		106-46-7	1.000	1,4-Dichlorobenzene	< 250	< 50	< 250	< 1	106-46-7	yes	yes	0.00	0.00	0.00	0.00	0.00
31	B			trans-1,4-Dichloro-2-butene	< 5000	< 1000	< 5000	< 20	110-57-6	no	yes	--	--	--	--	--
32	B			Dichlorodifluoromethane	< 250	< 50	< 250	< 1	75-71-8	no	exempt	--	--	--	--	--
33		75-34-3	1.000	1,1-Dichloroethane (Ethylidene dichloride)	< 250	< 50	< 250	< 1	75-34-3	yes	yes	0.00	0.00	0.00	0.00	0.00
34			1.000	1,2-Dichloroethane	< 250	< 50	< 250	< 1	107-06-2	yes	yes	0.00	0.00	0.00	0.00	0.00
35			1.000	1,1-Dichloroethene	< 250	< 50	< 250	< 1	75-35-4	yes	yes	0.00	0.00	0.00	0.00	0.00
36	B			cis-1,2-Dichloroethene	< 250	< 50	< 250	< 1	156-59-2	no	yes	--	--	--	--	--
37	B			trans-1,2-Dichloroethene	< 250	< 50	< 250	< 1	156-60-5	no	yes	--	--	--	--	--
38		78-87-5	1.000	1,2-Dichloropropane (Propylene dichloride)	< 250	< 50	< 250	< 1	78-87-5	yes	yes	0.00	0.00	0.00	0.00	0.00
39	A	542-75-6	1.000	1,3-Dichloropropene	< 250	< 50	< 250	< 1	542-75-6	no	yes	0.00	0.00	0.00	0.00	0.00
40	B			2,2-Dichloropropane	< 250	< 50	< 250	< 1	594-20-7	no	yes	--	--	--	--	--
41	B			1,1-Dichloropropene	< 250	< 50	< 250	< 1	563-58-6	no	yes	--	--	--	--	--
42	B			cis-1,3-Dichloropropene	< 250	< 50	< 250	< 1	10061-01-5	no	yes	--	--	--	--	--
43	B			trans-1,3-Dichloropropene	< 250	< 50	< 250	< 1	10061-02-6	no	yes	--	--	--	--	--
44		100-41-4	1.000	Ethylbenzene	2,930	< 50	1,170	1	101-41-4	yes	yes	2,930	2,930	0.00	1,170.00	1,388
45	B			Ethyl methacrylate	< 5000	< 1000	< 5000	< 20	97-63-2	no	yes	--	--	--	--	--
46		0.880		Hexachloro-1,3-butadiene	< 250	< 50	< 250	< 1	87-68-3	yes	yes	0.00	0.00	0.00	0.00	0.00
47		1.000		n-Hexane	< 600	< 100	< 500	< 2	110-54-3	yes	yes	0.00	0.00	0.00	0.00	0.00
48	B			2-Hexanone	< 500	< 100	< 500	< 2	591-78-6	no	yes	--	--	--	--	--
49		74-88-4	1.0001	Iodomethane (methyl iodide)	< 500	< 100	< 500	< 2	74-88-4	yes	yes	0.00	0.00	0.00	0.00	0.00
50		98-82-8	1.000	Isopropylbenzene (Cumene)	444	< 50	< 250	1	98-82-8	yes	yes	444	444	0.00	0.00	1,106
51	B			p-Isopropyltoluene	15,800	< 50	569	3	99-87-6	no	yes	--	--	--	--	--
52		1.000		Methylene chloride	< 1000	< 50	< 250	< 4	75-09-2	yes	exempt	0.00	0.00	0.00	0.00	0.00
53		0.9796		4-Methyl-2-pentanone (MIBK)	< 500	< 100	< 500	< 2	108-10-1	yes	yes	0.00	0.00	0.00	0.00	0.00
54		1.000		Methyl-tert-butyl-ether	< 180	< 40	< 180	< 0.18	1634-04-4	yes	yes	0.00	0.00	0.00	0.00	0.00
55	B			n-Propylbenzene	1,410	< 50	597	2	103-65-1	no	yes	--	--	--	--	--
56	C	100-42-5	1.000	Styrene	< 250	< 50	< 250	1	100-42-5	yes	yes	0.00	250	0.00	0.00	1,000.00
57	B			1, 1, 1, 2-Tetrachloroethane	< 250	< 50	< 250	< 1	630-20-6	no	yes	--	--	--	--	--
58		79-34-5	0.999	1, 1, 2, 2-Tetrachloroethane	< 250	< 50	< 250	< 1	79-34-5	yes	yes	0.00	0.00	0.00	0.00	0.00
59		1.000		Tetrachloroethene	1,780	< 50	257	< 1	127-18-4	yes	exempt	1,780	1,780	0.00	257.00	0.00
60		108-88-3	1.000	Toluene	22,000	< 50	6,610	3	108-88-3	yes	yes	22,000	22,000	0.00	6,610.00	3,098
61	B			1, 2, 3-Trichlorobenzene	< 250	102	< 250	4	87-61-6	no	yes	--	--	--	--	--
62	C	120-82-1	1.000	1, 2, 4-Trichlorobenzene	< 250	< 50	< 250	2	120-82-1	yes	yes	0.00	250	0.00	0.00	2,198
63		71-55-6	1.000	1, 1, 1-Trichloroethane (methyl chloroform)	< 250	< 50	< 250	< 1	71-55-6	yes	exempt	0.00	0.00	0.00	0.00	0.00
64		1		1, 1, 2-Trichloroethane	< 250	< 50	< 250	< 1	79-00-5	yes	yes	0.00	0.00	0.00	0.00	0.00
65		1.000		Trichloroethene	878	< 50	400	< 1	79-01-6	yes	yes	878	878	0.00	400.00	0.00

Code Key	
A	In 40 CFR 63, Subpart DD Table 1, but not a HAP
B	Not a HAP, but in 40 CFR 63, Subpart DD Table 1
C	Chemical was found in the outgoing but not in the incoming
Sample Result above the detect limit	

Table IDs		From 40 CFR 63, Subpart DD Table 1		Chemical	Sludge (ug/kg)	Wastewater (ug/L)	Soil (ug/kg)	Oil and Kiln (mg/kg)	IDEM Research			Incoming HAPs as tested		Outgoing HAPs as tested		
ID	Code	CAS No.	40 CFR 63, Subpart DD						CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products (ug/kg)	Wastewater (DL set to 0) (ug/L)	Soil (DL set to 0) (ug/kg)	Oil (DL set to 0)
f _v 305										Yes/No						
66	B			Trichlorofluoromethane	58,100	< 50	< 250	< 1	75-69-4	no	exempt	--	--	--	--	--
67	B			1, 2, 3-Trichloropropane	< 250	< 50	< 250	< 1	96-18-4	no	yes	--	--	--	--	--
68	B			1,2,4-Trimethylbenzene	8,790	< 50	3,400	9	95-63-6	no	yes	--	--	--	--	--
69	B			1,3,5-Trimethylbenzene	3,480	< 50	1,390	3	108-67-8	no	yes	--	--	--	--	--
70		108-05-4	1.000	Vinyl acetate	< 500	< 50	< 500	< 2	108-05-4	yes	yes	0.00	0.00	0.00	0.00	0.00
71		75-01-4	1.000	Vinyl chloride	< 100	< 100	< 100	<	75-01-4	yes	yes	0.00	0.00	0.00	0.00	0.00
72			1.000	Xylene, M&P	10,500	< 20	2,780	4	108-38-3/106-42-3	yes	yes	10,500	10,500	0.00	2,780.00	4,198
73		108-38-3	1.000	m-Xylenes in subpart dd	Accounted for in Xylene, M&P				108-38-3	yes	yes	Accounted for in Xylene, M&P				
74		106-42-3	1.000	p-Xylenes in subpart dd	Accounted for in Xylene, M&P				106-42-3	yes	yes	Accounted for in Xylene, M&P				
75		95-47-6	1.000	Xylene, Ortho	4,410	< 50	1,140	2	95-47-6	yes	yes	4,410	4,410	0.00	1,140.00	2,238
76			1.000	Xylene, Total	14,900	< 50	3,920	6	1330-20-7	yes	yes	14,900	14,900	0.00	3,920.00	6,436

Table IDs		From 40 CFR 63, Subpart DD Table 1		Chemical	Sludge (mg/kg)	Wastewater (ug/L)	Soil (mg/kg)	Oil and Kiln (mg/kg)	IDEM Research			Incoming HAPs as tested		Outgoing HAPs as tested		
ID	Code	CAS No.	40 CFR 63, Subpart DD						CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products (ug/kg)	Wastewater (DL set to 0) (ug/L)	Soil (DL set to 0) (ug/kg)	Oil (DL set to 0)
78				Acenaphthene	< 100	< 300	< 30	< 160	83-32-9	yes	yes	0.00	0.00	0.00	0.00	0.00
79				Acenaphthylene	< 100	< 300	< 30	< 160	208-96-8	yes	yes	0.00	0.00	0.00	0.00	0.00
80				Aniline	< 100	< 300	< 30	< 160	62-53-3	yes	yes	0.00	0.00	0.00	0.00	0.00
81				Anthracene	< 100	< 300	< 30	< 160	120-12-7	yes	yes	0.00	0.00	0.00	0.00	0.00
82				Benzo(a) anthracene	< 100	< 300	< 30	< 160	56-55-3	yes	yes	0.00	0.00	0.00	0.00	0.00
83				Benzo(a) pyrene	< 100	< 300	< 30	< 160	50-32-8	yes	yes	0.00	0.00	0.00	0.00	0.00
84				Benzo(b) fluoranthene	< 100	< 300	< 30	< 160	205-99-2	yes	yes	0.00	0.00	0.00	0.00	0.00
85				Benzo(g,h,i)perylene	< 100	< 300	< 30	< 160	191-24-2	yes	yes	0.00	0.00	0.00	0.00	0.00
86				Benzo(k)fluoranthene	< 100	< 300	< 30	< 160	207-08-9	yes	yes	0.00	0.00	0.00	0.00	0.00
87	B			Benzoic Acid	< 500	< 1200	< 150	< 800	65-85-0	no	yes	--	--	--	--	--
88	B			Benzyl Alcohol	< 200	720	< 60	< 320	100-51-6	no	yes	--	--	--	--	--
89				4-Bromophenylphenyl ether	< 100	< 300	< 30	< 160	101-55-3	yes	yes	0.00	0.00	0.00	0.00	0.00
90				Butylbenzylphthalate	< 100	< 300	< 30	< 160	85-68-7	yes	yes	0.00	0.00	0.00	0.00	0.00
91				Carbazole	< 200	< 600	< 60	< 320	86-74-8	yes	yes	0.00	0.00	0.00	0.00	0.00
92	B			4-Chloro-3-methylphenol	< 200	< 600	< 60	< 320	59-50-7	no	yes	--	--	--	--	--
93	B			4-Chloroaniline	< 200	< 600	< 60	< 320	106-47-8	no	yes	--	--	--	--	--
94	B			bis(2-Chloroethoxy) methane	< 100	< 300	< 30	< 160	111-91-1	no	yes	--	--	--	--	--
95			0.757	bis(2-Chloroethyl) ether	< 100	< 300	< 30	< 160	111-44-4	yes	yes	0.00	0.00	0.00	0.00	0.00
96	B			bis(2-Chloroisopropyl) ether	< 100	< 300	< 30	< 160	108-60-1	no	yes	--	--	--	--	--
97				2-Chloronaphthalene	< 100	< 300	< 30	< 160	91-58-7	yes	yes	0.00	0.00	0.00	0.00	0.00
98	B			2-Chlorophenol	< 100	< 300	< 30	< 160	95-57-8	no	yes	--	--	--	--	--
99				4-Chlorophenylphenyl ether	< 100	< 300	< 30	< 160	7005-72-3	yes	yes	0.00	0.00	0.00	0.00	0.00
100				Chrysene	< 100	< 300	< 30	< 160	218-01-9	yes	yes	0.00	0.00	0.00	0.00	0.00
101				Dibenzo(a,h) anthracene	< 100	< 300	< 30	< 160	53-70-3	yes	yes	0.00	0.00	0.00	0.00	0.00
102			0.967	Dibenzofuran	< 100	< 300	< 30	< 160	132-64-9	yes	yes	0.00	0.00	0.00	0.00	0.00
103	B			1,2-Dichlorobenzene	< 100	< 300	< 30	< 160	95-50-1	no	yes	--	--	--	--	--
104	B			1,3-Dichlorobenzene	< 100	< 300	< 30	< 160	541-73-1	no	yes	--	--	--	--	--
105			1.000	1,4-Dichlorobenzene	< 100	< 300	< 30	< 160	106-46-7	yes	yes	0.00	0.00	0.00	0.00	0.00
106				3,3'-Dichlorobenzene	< 200	< 600	< 60	< 320	91-94-1	yes	yes	0.00	0.00	0.00	0.00	0.00
107	B			2,4-Dichlorophenol	< 100	< 300	< 30	< 160	120-83-2	no	yes	--	--	--	--	--
108	B			Diethylphthalate	< 100	< 300	< 30	< 160	84-66-2	no	yes	--	--	--	--	--
109	B			2,4-Dimethylphenol	< 100	< 300	< 30	< 160	105-67-9	no	yes	--	--	--	--	--
110				Dimethylphthalate	< 100	< 300	< 30	< 160	131-11-3	yes	yes	0.00	0.00	0.00	0.00	0.00
111				Di-n-butylphthalate	< 100	< 300	< 30	< 160	84-74-2	yes	yes	0.00	0.00	0.00	0.00	0.00
112				4,6-Dinitro-2-methylphenol	< 500	< 1200	< 150	< 800	534-52-1	yes	yes	0.00	0.00	0.00	0.00	0.00
113		51-28-5	0.0077	2,4-Dinitrophenol	< 500	< 1200	< 150	< 800	51-28-5	yes	yes	0.00	0.00	0.00	0.00	0.00
114		121-14-2	0.0848	2,4-Dinitrotoluene	< 100	< 300	< 30	< 160	121-14-2	yes	yes	0.00	0.00	0.00	0.00	0.00
115	B			2,6-Dinitrotoluene	< 100	< 300	< 30	< 160	606-20-2	no	yes	--	--	--	--	--
116	B			Di-n-octylphthalate	< 100	< 300	< 30	< 160	117-84-0	no	yes	--	--	--	--	--
117				bis(2-Ethylhexyl)phthalate	< 100	< 150	< 30	< 160	117-81-7	yes	yes	0.00	0.00	0.00	0.00	0.00
118				Fluoranthene	< 100	< 300	< 30	< 160	206-44-0	yes	yes	0.00	0.00	0.00	0.00	0.00
119				Fluorene	< 100	< 300	< 30	< 160	86-73-7	yes	yes	0.00	0.00	0.00	0.00	0.00
120			0.88	Hexachloro-1,3-butadiene	< 100	< 300	< 30	< 160	87-68-3	yes	yes	0.00	0.00	0.00	0.00	0.00
121		118-74-1	0.97	Hexachlorobenzene	< 100	< 150	< 30	< 160	118-74-1	yes	yes	0.00	0.00	0.00	0.00	0.00
122				Hexachlorocyclopentadiene	< 100	< 600	< 30	< 160	77-47-4	yes	yes	0.00	0.00	0.00	0.00	0.00
123		67-72-1	0.499	Hexachloroethane	< 100	< 300	< 30	< 160	67-72-1	yes	yes	0.00	0.00	0.00	0.00	0.00
124				Indeno(1,2,3-c,d) pyrene	< 100	< 300	< 30	< 160	193-39-5	yes	yes	0.00	0.00	0.00	0.00	0.00

Code Key	
A	In 40 CFR 63, Subpart DD Table 1, but not a HAP
B	Not a HAP, but in 40 CFR 63, Subpart DD Table 1
C	Chemical was found in the outgoing but not in the incoming
Sample Result above the detect limit	

Table IDs		From 40 CFR 63, Subpart DD Table 1		Chemical	Sludge	Wastewater	Soil	Oil and Kiln	IDEM Research			Incoming HAPs as tested		Outgoing HAPs as tested		
ID	Code	CAS No.	40 CFR 63, Subpart DD						CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
f _v 305					(ug/kg)	(ug/L)	(ug/kg)	(mg/kg)		Yes/No			(ug/kg)	(ug/L)	(ug/kg)	
125		78-59-1	0.506	Isophorone	< 100	< 300	< 30	< 160	78-59-1	yes	yes	0.00	0.00	0.00	0.00	0.00
126	C			2-Methylnaphthalene	< 100	< 300	< 30	26.40	91-57-6	yes	yes	0.00	100000	0.00	26,400.00	0.00
127				2-Methylphenol (o-Cresol)	< 100	< 300	< 30	< 160	95-48-7	yes	yes	0.00	0.00	0.00	0.00	0.00
128				3-Methylphenol (m-cresol)	< 200	< 600	< 60	< 320	108-39-4	yes	yes	0.00	0.00	0.00	0.00	0.00
129				4-Methylphenol (p-cresol)	No Data				106-44-5	yes	yes	No Data		0.00	0.00	0.00
130	C	91-20-3	0.994	Naphthalene	< 100	< 150	< 30	18.70	91-20-3	yes	yes	0.00	100000	0.00	18,700.00	0.00
131	B			2-Nitroaniline	< 500	< 1200	< 150	< 800	88-74-4	no	yes	--	--	--	--	--
132	B			3-Nitroaniline	< 500	< 1200	< 150	< 800	99-09-2	no	yes	--	--	--	--	--
133	B			4-Nitroaniline	< 500	< 1200	< 150	< 800	100-01-6	no	yes	--	--	--	--	--
134		98-95-3	0.394	Nitrobenzene	< 100	< 300	< 30	< 160	98-95-3	yes	yes	0.00	0.00	0.00	0.00	0.00
135	B			2-Nitrophenol	< 100	< 300	< 30	< 160	88-75-5	no	yes	--	--	--	--	--
136				4-Nitrophenol	< 500	< 1200	< 150	< 800	100-02-7	yes	yes	0.00	0.00	0.00	0.00	0.00
137	B			N-Nitroso-di-n-propylamine	< 100	< 300	< 30	< 160	621-64-7	no	yes	--	--	--	--	--
138				N-Nitrosodiphenylamine	< 100	< 300	< 30	< 160	86-30-6	yes	yes	0.00	0.00	0.00	0.00	0.00
139		87-86-5	0.0898	Pentachlorophenol	< 500	< 1200	< 150	< 800	87-86-5	yes	yes	0.00	0.00	0.00	0.00	0.00
140				Phenanthrene	< 100	< 300	< 30	< 160	85-01-8	yes	yes	0.00	0.00	0.00	0.00	0.00
141	C			Phenol	< 100	3,090	< 30	< 160	108-95-2	yes	yes	0.00	100000	3,090.00	0.00	0.00
142				Pyrene	< 100	< 300	< 30	< 160	129-00-0	yes	yes	0.00	0.00	0.00	0.00	0.00
143		1.000		1,2,4-Trichlorobenzene	< 100	< 300	< 30	< 160	120-82-1	yes	yes	0.00	0.00	0.00	0.00	0.00
144		95-95-4	0.108	2,4,5-Trichlorophenol	< 100	< 300	< 30	< 160	95-95-4	yes	yes	0.00	0.00	0.00	0.00	0.00
145		88-06-2	0.132	2,4,6-Trichlorophenol	< 100	< 300	< 30	< 160	88-06-2	yes	yes	0.00	0.00	0.00	0.00	0.00

Table IDs		From 40 CFR 63, Subpart DD Table 1		Chemical	Sludge	Wastewater	Soil	Oil and Kiln	IDEM Research			Incoming HAPs as tested		Outgoing HAPs as tested		
ID	Code	CAS No.	40 CFR 63, Subpart DD						CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
138		75-07-0	1.000	Acetaldehyde								No Data				
139		75-05-8	0.989	Acetonitrile								No Data				
140		98-86-2	0.314	Acetophenone								No Data				
141		107-05-1	1.000	Allyl chloride								No Data				
142		98-07-7	0.958	Benzotrchloride (isomers and mixture)								No Data				
143		100-44-7	1.000	Benzyl chloride								No Data				
144		92-52-4	0.864	Biphenyl								No Data				
145		542-88-1	0.999	Bis(chloromethyl)ether ^b								No Data				
146		106-99-0	1.000	1,3-Butadiene								No Data				
147		43-58-1	1.000	Carbonyl sulfide								No Data				
148		133-90-4	0.633	Chloramben								No Data				
149		107-30-2	1.000	Chloromethyl methyl ether ^b								No Data				
150		126-99-8	1.000	Chloroprene								No Data				
151		94-75-7	0.167	2,4-D, salts and esters								No Data				
152		334-88-3	0.999	Diazomethane ^c								No Data				
153		79-44-7	0.150	Dimethyl carbamoyl chloride ^c								No Data				
154		64-67-5	0.003	Diethyl sulfate								No Data				
155		77-78-1	0.086	Dimethyl sulfate								No Data				
156		121-69-7	0.001	N,N-Dimethylaniline								No Data				
157		123-91-1	0.869	1,4-Dioxane (1,4-Diethyleneoxide)								No Data				
158		106-89-8	0.939	Epichlorohydrin (1-Chloro-2,3-epoxypropane)								No Data				
159		106-88-7	1.000	1,2-Epoxybutane								No Data				
160		140-88-5	1.000	Ethyl acrylate								No Data				
161		151-56-4	0.867	Ethylene imine (Aziridine)								No Data				
162		75-21-8	1.000	Ethylene oxide								No Data				
163		58-89-9	0.855	Lindane (all isomers)								No Data				
164		67-56-1	0.980	Methanol								No Data				
165		624-83-9	0.916	Methyl isocyanate								No Data				
166		80-62-6	1.000	Methyl methacrylate								No Data				
167		79-46-9	0.839	2-Nitropropane								No Data				
168		82-68-8	1.000	Pentachloronitrobenzene (Quintobenzene)								No Data				
169		75-44-5	0.999	Phosgene ^c								No Data				
170		123-38-6	1.000	Propionaldehyde								No Data				
171		75-56-9	0.945	Propylene oxide								No Data				
172		75-85-8	0.830	1,2-Propylenimine (2-Methyl aziridine)								No Data				
173		96-09-3	1.000	Styrene oxide								No Data				
174		95-53-4	1.000	o-Toluidine								No Data				
175		121-44-8	1.000	Triethylamine								No Data				

Code Key	
A	In 40 CFR 63, Subpart DD Table 1, but not a HAP
B	Not a HAP, but in 40 CFR 63, Subpart DD Table 1
C	Chemical was found in the outgoing but not in the incoming
Sample Result above the detect limit	

Table IDs		From 40 CFR 63, Subpart DD Table 1							IDEM Research			Incoming HAPs as tested		Outgoing HAPs as tested		
ID	Code	CAS No.	40 CFR 63, Subpart DD	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
f _w 305					(ug/kg)	(ug/L)	(ug/kg)	(mg/kg)	Yes/No			(ug/kg)		(ug/L)	(ug/kg)	
176		540-84-1	1.000	2,2,4-Trimethylpentane	No Data											
177		593-60-2	1.000	Vinyl bromide	No Data											

	PTE Based on Max Capacity					
	Incoming		Outgoing			
	DL set to 0	DL set to 0 unless found in outgoing products	Soil (DL set to 0)	Oil (DL set to 0)	Wastewater (DL set to 0)	
sum (ug/kg)	59,131.00	359,881.00	61,723.50	21,662.00		sum (ug/L) (lb/gal)
(lb/ton)	0.12	0.72	1.23E-01	4.33E-02		
Max Capacity (tpy)					3,238.00	
					2.70E-05	
		289,100.00	289,100.00	60.00	21,998.13	
					130,913,368.00	Max Capacity (gal/yr)
HAPs (lb/yr)	34,189.19	208,081.05	7.41	12,524.84		
HAPs (tpy)	17.09	104.04	3.70E-03	6.26	3,537.60	
					1.77	

Notes:

DL = Detect Level

The incoming HAPs were calculated using incoming waste materials (sludge) test dated. The samples were collected in February 2013. When calculating the Incoming HAPs, all non-detect samples and samples that were below the detect level where set to zero.

This is shown in the above tables in the DL set to 0 columns.

The outgoing HAPs were calculated using wastewater, Soil, and Oil test dated. The samples were collected in September 2012, April 2013 and May 2013. For these calculations, the non-detect samples and samples that were below the detect level where set to zero.

This is shown in the above tables under the columns labeled Soil (DL set to 0), Oil (DL set to 0), and Wastewater (DL set to 0).

In some of the samples, a number of chemicals showed up in the outgoing samples that was at a concentration less than the detect level in the incoming sludge. In these cases, the detect level was used to when calculating the incoming HAPS in order to be conservative.

This is shown in the above tables in the DL set to 0 unless found in outgoing products columns.

Conversion Factors:

2.20E-09 lb/ug	2.20E-09 lb/ug
9.07E+02 kg/ton	3.79E+00 L/gal
7.00E+07 gal/yr	8.26E+00 lb/gal

Code Key
Sample Result above the detect limit

Table IDs		IDEM Research					Incoming VOCs as tested		Outgoing VOCs as tested				
ID	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
		(ug/kg)	(ug/L)	(ug/kg)	(mg/kg)			Yes/No		(ug/kg)	(ug/L)	(ug/kg)	
1	Acetone	16,400	31,600	< 5000	144	67-64-1	no	exempt	--	--	--	--	--
2	Acrolein	< 5000	< 1000	< 5000	< 20	107-02-8	yes	yes	0.00	0.00	0.00	0.00	0.00
3	Acrylonitrile	< 5000	< 1000	< 5000	< 20	107-13-1	yes	yes	0.00	0.00	0.00	0.00	0.00
4	Benzene	1,290	< 5	347	< 1	71-43-2	yes	yes	1,290	1,290	0.00	346.50	0.00
5	Bromobenzene	< 250	< 50	< 250	< 1	108-86-1	no	yes	0.00	0.00	0.00	0.00	0.00
6	Bromochloromethane	< 250	< 50	< 250	< 1	74-97-5	no	yes	0.00	0.00	0.00	0.00	0.00
7	Bromodichloromethane	< 250	< 50	< 250	< 1	75-27-4	no	yes	0.00	0.00	0.00	0.00	0.00
8	Bromoform	< 250	< 50	< 250	< 1	75-25-2	yes	yes	0.00	0.00	0.00	0.00	0.00
9	Bromomethane (Methyl bromide)	< 250	< 50	< 250	< 1	74-83-9	yes	yes	0.00	0.00	0.00	0.00	0.00
10	n-Butanol	< 2500	< 500	< 2500	< 10	71-36-3	no	yes	0.00	0.00	0.00	0.00	0.00
11	2-Butanone (MEK)	< 500	< 100	< 500	< 2	78-93-3	no	yes	0.00	0.00	0.00	0.00	0.00
12	n-Butylbenzene	688	< 50	405	2	104-51-8	no	yes	688.00	688.00	0.00	405.00	1,888
13	sec-Butylbenzene	611	< 50	261	2	135-98-8	no	yes	611.00	611.00	0.00	260.50	1,582
14	tert-Butylbenzene	< 250	< 50	< 250	< 1	98-06-6	no	yes	0.00	0.00	0.00	0.00	0.00
15	Carbon Disulfide	< 250	< 50	< 250	< 1	75-15-0	yes	yes	0.00	0.00	0.00	0.00	0.00
16	Carbon Tetrachloride	< 250	< 50	< 250	< 1	56-23-5	yes	yes	0.00	0.00	0.00	0.00	0.00
17	Chlorobenzene	< 250	< 50	< 250	< 1	108-90-7	yes	yes	0.00	0.00	0.00	0.00	0.00
18	Chloroethane (Ethyl Chloride)	< 250	< 50	< 250	< 1	75-00-3	yes	yes	0.00	0.00	0.00	0.00	0.00
19	2-Chloroethylvinylether	< 2500	< 500	< 2500	< 10	110-75-8	no	yes	0.00	0.00	0.00	0.00	0.00
20	Chloroform	< 250	148	< 250	< 1	67-66-3	yes	yes	0.00	250	148.00	0.00	0.00
21	Chloromethane (methyl chloride)	< 250	< 50	< 250	< 1	74-87-3	yes	yes	0.00	0.00	0.00	0.00	0.00
22	2-Chlorotoluene	< 250	< 50	< 250	< 1	95-49-8	no	yes	0.00	0.00	0.00	0.00	0.00
23	4-Chlorotoluene	< 250	< 50	< 250	< 1	106-43-4	no	yes	0.00	0.00	0.00	0.00	0.00
24	1,2-Dibromo-3-chloropropane	< 250	< 50	< 250	< 1	96-12-8	yes	yes	0.00	0.00	0.00	0.00	0.00
25	Dibromochloromethane	< 250	< 50	< 250	< 1	124-48-1	no	yes	0.00	0.00	0.00	0.00	0.00
26	1,2-Dibromoethane (EDB)	< 250	< 50	< 250	< 1	106-93-4	yes	yes	0.00	0.00	0.00	0.00	0.00
27	Dibromomethane	< 250	< 50	< 250	< 1	74-95-3	no	yes	0.00	0.00	0.00	0.00	0.00
28	1,2-Dichlorobenzene	< 250	< 50	< 250	< 1	95-50-1	no	yes	0.00	0.00	0.00	0.00	0.00
29	1,3-Dichlorobenzene	< 250	< 50	< 250	< 1	541-73-1	no	yes	0.00	0.00	0.00	0.00	0.00
30	1,4-Dichlorobenzene	< 250	< 50	< 250	< 1	106-46-7	yes	yes	0.00	0.00	0.00	0.00	0.00
31	trans-1,4-Dichloro-2-butene	< 5000	< 1000	< 5000	< 20	110-57-6	no	yes	0.00	0.00	0.00	0.00	0.00
32	Dichlorodifluoromethane	< 250	< 50	< 250	< 1	75-71-8	no	exempt	--	--	0.00	0.00	--
33	1,1-Dichloroethane (Ethylidene dichloride)	< 250	< 50	< 250	< 1	75-34-3	yes	yes	0.00	0.00	0.00	0.00	0.00
34	1,2-Dichloroethane	< 250	< 50	< 250	< 1	107-06-2	yes	yes	0.00	0.00	0.00	0.00	0.00
35	1,1-Dichloroethene	< 250	< 50	< 250	< 1	75-35-4	yes	yes	0.00	0.00	0.00	0.00	0.00
36	cis-1,2-Dichloroethene	< 250	< 50	< 250	< 1	156-59-2	no	yes	0.00	0.00	0.00	0.00	0.00
37	trans-1,2-Dichloroethene	< 250	< 50	< 250	< 1	156-60-5	no	yes	0.00	0.00	0.00	0.00	0.00
38	1,2-Dichloropropane (Propylene dichloride)	< 250	< 50	< 250	< 1	78-87-5	yes	yes	0.00	0.00	0.00	0.00	0.00
39	1,3-Dichloropropene	< 250	< 50	< 250	< 1	542-75-6	no	yes	0.00	0.00	0.00	0.00	0.00
40	2,2-Dichloropropane	< 250	< 50	< 250	< 1	594-20-7	no	yes	0.00	0.00	0.00	0.00	0.00
41	1,1-Dichloropropene	< 250	< 50	< 250	< 1	563-58-6	no	yes	0.00	0.00	0.00	0.00	0.00
42	cis-1,3-Dichloropropene	< 250	< 50	< 250	< 1	10061-01-5	no	yes	0.00	0.00	0.00	0.00	0.00
43	trans-1,3-Dichloropropene	< 250	< 50	< 250	< 1	10061-02-6	no	yes	0.00	0.00	0.00	0.00	0.00
44	Ethylbenzene	2,930	< 50	1,170	1	101-41-4	yes	yes	2,930	2,930	0.00	1,170.00	1,388
45	Ethyl methacrylate	< 5000	< 1000	< 5000	< 20	97-63-2	no	yes	0.00	0.00	0.00	0.00	0.00
46	Hexachloro-1,3-butadiene	< 250	< 50	< 250	< 1	87-68-3	yes	yes	0.00	0.00	0.00	0.00	0.00
47	n-Hexane	< 600	< 100	< 500	< 2	110-54-3	yes	yes	0.00	0.00	0.00	0.00	0.00
48	2-Hexanone	< 500	< 100	< 500	< 2	591-78-6	no	yes	0.00	0.00	0.00	0.00	0.00
49	Iodomethane (methyl iodide)	< 500	< 100	< 500	< 2	74-88-4	yes	yes	0.00	0.00	0.00	0.00	0.00
50	Isopropylbenzene (Cumene)	444	< 50	< 250	1	98-82-8	yes	yes	444	444	0.00	0.00	1,106
51	p-Isopropyltoluene	15,800	< 50	569	3	99-87-6	no	yes	15,800.00	15,800	0.00	569.00	3,400
52	Methylene chloride	< 1000	< 50	< 250	< 4	75-09-2	yes	exempt	--	--	--	--	--
53	4-Methyl-2-pentanone (MIBK)	< 500	< 100	< 500	< 2	108-10-1	yes	yes	0.00	0.00	0.00	0.00	0.00
54	Methyl-tert-butyl-ether	< 180	< 40	< 180	< 0.18	1634-04-4	yes	yes	0.00	0.00	0.00	0.00	0.00
55	n-Propylbenzene	1,410	< 50	597	2	103-65-1	no	yes	1,410.00	1,410.00	0.00	597.00	1,840

Code Key
Sample Result above the detect limit

Table IDs		IDEM Research					Incoming VOCs as tested		Outgoing VOCs as tested				
ID	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
		(ug/kg)	(ug/L)	(ug/kg)	(mg/kg)		Yes/No			(ug/kg)	(ug/L)		(ug/kg)
56	Styrene	< 250	< 50	< 250	1	100-42-5	yes	yes	0.00	250	0.00	0.00	1,000
57	1, 1, 1, 2-Tetrachloroethane	< 250	< 50	< 250	< 1	630-20-6	no	yes	0.00	0.00	0.00	0.00	0.00
58	1, 1, 2, 2-Tetrachloroethane	< 250	< 50	< 250	< 1	79-34-5	yes	yes	0.00	0.00	0.00	0.00	0.00
59	Tetrachloroethene	1,780	< 50	257	< 1	127-18-4	yes	exempt	--	--	0.00	0.00	0.00
60	Toluene	22,000	< 50	6,610	3	108-88-3	yes	yes	22,000	22,000	0.00	6,610.00	3,098
61	1, 2, 3-Trichlorobenzene	< 250	102	< 250	4	87-61-6	no	yes	0.00	250	102.00	0.00	4,136
62	1, 2, 4-Trichlorobenzene	< 250	< 50	< 250	2	120-82-1	yes	yes	0.00	250	0.00	0.00	2,198
63	1, 1, 1-Trichloroethane (methyl chloroform)	< 250	< 50	< 250	< 1	71-55-6	yes	exempt	--	--	--	--	--
64	1, 1, 2-Trichloroethane	< 250	< 50	< 250	< 1	79-00-5	yes	yes	0.00	0.00	0.00	0.00	0.00
65	Trichloroethene	878	< 50	400	< 1	79-01-6	yes	yes	878	878	0.00	400.00	0.00
66	Trichlorofluoromethane	58,100	< 50	< 250	< 1	75-69-4	no	exempt	--	--	--	--	--
67	1, 2, 3-Trichloropropane	< 250	< 50	< 250	< 1	96-18-4	no	yes	0.00	0.00	0.00	0.00	0.00
68	1,2,4-Trimethylbenzene	8,790	< 50	3,400	9	95-63-6	no	yes	8,790.00	8,790.00	0.00	3,400.00	9,138
69	1,3,5-Trimethylbenzene	3,480	< 50	1,390	3	108-67-8	no	yes	3,480.00	3,480.00	0.00	1,390.00	2,822
70	Vinyl acetate	< 500	< 50	< 500	< 2	108-05-4	yes	yes	0.00	0.00	0.00	0.00	0.00
71	Vinyl chloride	< 100	< 100	< 100	< 1	75-01-4	yes	yes	0.00	0.00	0.00	0.00	0.00
72	Xylene, M&P	10,500	< 20	2,780	4	108-38-3/106-42-3	yes	yes	10,500	10,500	0.00	2,780.00	4,198
73	m-Xylenes in subpart dd	Accounted for in Xylene, M&P				108-38-3	yes	yes	Accounted for in Xylene, M&P				
74	p-Xylenes in subpart dd	Accounted for in Xylene, M&P				106-42-3	yes	yes	Accounted for in Xylene, M&P				
75	Xylene, Ortho	4,410	< 50	1,140	2	95-47-6	yes	yes	4,410	4,410	0.00	1,140.00	2,238
76	Xylene, Total	14,900	< 50	3,920	6	1330-20-7	yes	yes	14,900	14,900	0.00	3,920.00	6,436

Table IDs		IDEM Research					Incoming VOCs as tested		Outgoing VOCs as tested				
ID	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
		(mg/kg)	(ug/L)	(mg/kg)	(mg/kg)			Yes/No		(ug/kg)	(ug/L)	(ug/kg)	(ug/kg)
78	Acenaphthene	< 100	< 300	< 30	< 160	83-32-9	yes	yes	0.00	0.00	0.00	0.00	0.00
79	Acenaphthylene	< 100	< 300	< 30	< 160	208-96-8	yes	yes	0.00	0.00	0.00	0.00	0.00
80	Aniline	< 100	< 300	< 30	< 160	62-53-3	yes	yes	0.00	0.00	0.00	0.00	0.00
81	Anthracene	< 100	< 300	< 30	< 160	120-12-7	yes	yes	0.00	0.00	0.00	0.00	0.00
82	Benzo(a) anthracene	< 100	< 300	< 30	< 160	56-55-3	yes	yes	0.00	0.00	0.00	0.00	0.00
83	Benzo(a) pyrene	< 100	< 300	< 30	< 160	50-32-8	yes	yes	0.00	0.00	0.00	0.00	0.00
84	Benzo(b) fluoranthene	< 100	< 300	< 30	< 160	205-99-2	yes	yes	0.00	0.00	0.00	0.00	0.00
85	Benzo(b,h,i)perylene	< 100	< 300	< 30	< 160	191-24-2	yes	yes	0.00	0.00	0.00	0.00	0.00
86	Benzo(k)fluoranthene	< 100	< 300	< 30	< 160	207-08-9	yes	yes	0.00	0.00	0.00	0.00	0.00
87	Benzoic Acid	< 500	< 1200	< 150	< 800	65-85-0	no	yes	0.00	0.00	0.00	0.00	0.00
88	Benzyl Alcohol	< 200	720	< 60	< 320	100-51-6	no	yes	0.00	200,000.00	720.00	0.00	0.00
89	4-Bromophenyl/phenyl ether	< 100	< 300	< 30	< 160	101-55-3	yes	yes	0.00	0.00	0.00	0.00	0.00
90	Butylbenzylphthalate	< 100	< 300	< 30	< 160	85-68-7	yes	yes	0.00	0.00	0.00	0.00	0.00
91	Carbazole	< 200	< 600	< 60	< 320	86-74-8	yes	yes	0.00	0.00	0.00	0.00	0.00
92	4-Chloro-3-methylphenol	< 200	< 600	< 60	< 320	59-50-7	no	yes	0.00	0.00	0.00	0.00	0.00
93	4-Chloroaniline	< 200	< 600	< 60	< 320	106-47-8	no	yes	0.00	0.00	0.00	0.00	0.00
94	bis(2-Chloroethoxy) methane	< 100	< 300	< 30	< 160	111-91-1	no	yes	0.00	0.00	0.00	0.00	0.00
95	bis(2-Chloroethyl) ether	< 100	< 300	< 30	< 160	111-44-4	yes	yes	0.00	0.00	0.00	0.00	0.00
96	bis(2-Chloroisopropyl) ether	< 100	< 300	< 30	< 160	108-60-1	no	yes	0.00	0.00	0.00	0.00	0.00
97	2-Chloronaphthalene	< 100	< 300	< 30	< 160	91-58-7	yes	yes	0.00	0.00	0.00	0.00	0.00
98	2-Chlorophenol	< 100	< 300	< 30	< 160	95-57-3	no	yes	0.00	0.00	0.00	0.00	0.00
99	4-Chlorophenyl/phenyl ether	< 100	< 300	< 30	< 160	7005-72-3	yes	yes	0.00	0.00	< 0.00	0.00	0.00
100	Chrysene	< 100	< 300	< 30	< 160	218-01-9	yes	yes	0.00	0.00	0.00	0.00	0.00
101	Dibenzo(a,h) anthracene	< 100	< 300	< 30	< 160	53-70-3	yes	yes	0.00	0.00	0.00	0.00	0.00
102	Dibenzofuran	< 100	< 300	< 30	< 160	132-64-9	yes	yes	0.00	0.00	0.00	0.00	0.00
103	1,2-Dichlorobenzene	< 100	< 300	< 30	< 160	95-50-1	no	yes	0.00	0.00	0.00	0.00	0.00
104	1,3-Dichlorobenzene	< 100	< 300	< 30	< 160	541-73-1	no	yes	0.00	0.00	0.00	0.00	0.00
105	1,4-Dichlorobenzene	< 100	< 300	< 30	< 160	106-46-7	yes	yes	0.00	0.00	0.00	0.00	0.00
106	3,3'-Dichlorobenzene	< 200	< 600	< 60	< 320	91-94-1	yes	yes	0.00	0.00	0.00	0.00	0.00
107	2,4-Dichlorophenol	< 100	< 300	< 30	< 160	120-83-2	no	yes	0.00	0.00	0.00	0.00	0.00
108	Diethylphthalate	< 100	< 300	< 30	< 160	84-66-2	no	yes	0.00	0.00	0.00	0.00	0.00
109	2,4-Dimethylphenol	< 100	< 300	< 30	< 160	105-67-9	no	yes	0.00	0.00	0.00	0.00	0.00
110	Dimethylphthalate	< 100	< 300	< 30	< 160	131-11-3	yes	yes	0.00	0.00	0.00	0.00	0.00
111	Di-n-butylphthalate	< 100	< 300	< 30	< 160	94-74-2	yes	yes	0.00	0.00	0.00	0.00	0.00
112	4,6-Dinitro-2-methylphenol	< 500	< 1200	< 150	< 800	534-52-1	yes	yes	0.00	0.00	< 0.00	0.00	0.00
113	2,4-Dinitrophenol	< 500	< 1200	< 150	< 800	51-28-5	yes	yes	0.00	0.00	0.00	0.00	0.00
114	2,4-Dinitrotoluene	< 100	< 300	< 30	< 160	121-14-2	yes	yes	0.00	0.00	0.00	0.00	0.00
115	2,6-Dinitrotoluene	< 100	< 300	< 30	< 160	606-20-2	no	yes	0.00	0.00	0.00	0.00	0.00
116	Di-n-octylphthalate	< 100	< 300	< 30	< 160	117-84-0	no	yes	0.00	0.00	0.00	0.00	0.00
117	bis(2-Ethylhexyl)phthalate	< 100	< 150	< 30	< 160	117-81-7	yes	yes	0.00	0.00	0.00	0.00	0.00
118	Fluoranthene	< 100	< 300	< 30	< 160	206-44-0	yes	yes	0.00	0.00	0.00	0.00	0.00
119	Fluorene	< 100	< 300	< 30	< 160	86-73-7	yes	yes	0.00	0.00	0.00	0.00	0.00
120	Hexachloro-1,3-butadiene	< 100	< 300	< 30	< 160	87-68-3	yes	yes	0.00	0.00	0.00	0.00	0.00
121	Hexachlorobenzene	< 100	< 150	< 30	< 160	118-74-1	yes	yes	0.00	0.00	0.00	0.00	0.00
122	Hexachlorocyclopentadiene	< 100	< 600	< 30	< 160	77-47-4	yes	yes	0.00	0.00	0.00	0.00	0.00
123	Hexachloroethane	< 100	< 300	< 30	< 160	67-72-1	yes	yes	0.00	0.00	0.00	0.00	0.00
124	Indeno(1,2,3-c,d) pyrene	< 100	< 300	< 30	< 160	193-39-5	yes	yes	0.00	0.00	0.00	0.00	0.00
125	Isophorone	< 100	< 300	< 30	< 160	78-59-1	yes	yes	0.00	0.00	< 0.00	0.00	0.00
126	2-Methylnaphthalene	< 100	< 300	< 30	26,40	91-57-6	yes	yes	0.00	100,000.00	0.00	0.00	26,400.00
127	2-Methylphenol (o-Cresol)	< 100	< 300	< 30	< 160	95-48-7	yes	yes	0.00	0.00	0.00	0.00	0.00
128	3-Methylphenol (m-cresol)	< 200	< 600	< 60	< 320	108-39-4	yes	yes	0.00	0.00	0.00	0.00	0.00
129	4-Methylphenol (p-cresol)		No Data			106-44-5	yes	yes		No Data		0.00	0.00

Code Key
Sample Result above the detect limit

Table IDs						IDEM Research			Incoming VOCs as tested		Outgoing VOCs as tested		
ID	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
		(ug/kg)	(ug/L)	(ug/kg)	(mg/kg)			Yes/No		(ug/kg)	(ug/L)		(ug/kg)
130	Naphthalene	< 100	< 150	< 30	18.70	91-20-3	yes	yes	0.00	100,000.00	0.00	0.00	18,700.00
131	2-Nitroaniline	< 500	< 1200	< 150	< 800	88-74-4	no	yes	0.00	0.00	0.00	0.00	0.00
132	3-Nitroaniline	< 500	< 1200	< 150	< 800	99-09-2	no	yes	0.00	0.00	0.00	0.00	0.00
133	4-Nitroaniline	< 500	< 1200	< 150	< 800	100-01-6	no	yes	0.00	0.00	0.00	0.00	0.00
134	Nitrobenzene	< 100	< 300	< 30	< 160	98-95-3	yes	yes	0.00	0.00	0.00	0.00	0.00
135	2-Nitrophenol	< 100	< 300	< 30	< 160	88-75-5	no	yes	0.00	0.00	0.00	0.00	0.00
136	4-Nitrophenol	< 500	< 1200	< 150	< 800	100-02-7	yes	yes	0.00	0.00	0.00	0.00	0.00
137	N-Nitroso-di-n-propylamine	< 100	< 300	< 30	< 160	621-64-7	no	yes	0.00	0.00	0.00	0.00	0.00
138	N-Nitrosodiphenylamine	< 100	< 300	< 30	< 160	86-30-6	yes	yes	0.00	0.00	0.00	0.00	0.00
139	Pentachlorophenol	< 500	< 1200	< 150	< 800	87-86-5	yes	yes	0.00	0.00	0.00	0.00	0.00
140	Phenanthrene	< 100	< 300	< 30	< 160	85-01-8	yes	yes	0.00	0.00	0.00	0.00	0.00
141	Phenol	< 100	3,090	< 30	< 160	108-95-2	yes	yes	0.00	100,000.00	3,090.00	0.00	0.00
142	Pyrene	< 100	< 300	< 30	< 160	129-00-0	yes	yes	0.00	0.00	0.00	0.00	0.00
143	1,2,4-Trichlorobenzene	< 100	< 300	< 30	< 160	120-82-1	yes	yes	0.00	0.00	0.00	0.00	0.00
144	2,4,5-Trichlorophenol	< 100	< 300	< 30	< 160	95-95-4	yes	yes	0.00	0.00	0.00	0.00	0.00
145	2,4,6-Trichlorophenol	< 100	< 300	< 30	< 160	88-06-2	yes	yes	0.00	0.00	0.00	0.00	0.00

Table IDs						IDEM Research			Incoming VOCs as tested		Outgoing VOCs as tested		
ID	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)
138	Acetaldehyde								No Data				
139	Acetonitrile								No Data				
140	Acetophenone								No Data				
141	Allyl chloride								No Data				
142	Benzotrithiolide (isomers and mixture)								No Data				
143	Benzyl chloride								No Data				
144	Biphenyl								No Data				
145	Bis(chloromethyl)ether °								No Data				
146	1,3-Butadiene								No Data				
147	Carbonyl sulfide								No Data				
148	Chloramben								No Data				
149	Chloromethyl methyl ether °								No Data				
150	Chloroprene								No Data				
151	2,4-D, salts and esters								No Data				
152	Diazomethane °								No Data				
153	Dimethyl carbamoyl chloride °								No Data				
154	Diethyl sulfate								No Data				
155	Dimethyl sulfate								No Data				
156	N,N-Dimethylaniline								No Data				
157	1,4-Dioxane (1,4-Diethyleneoxide)								No Data				
158	Epichlorohydrin (1-Chloro-2,3-epoxypropane)								No Data				
159	1,2-Epoxybutane								No Data				
160	Ethyl acrylate								No Data				
161	Ethylene imine (Aziridine)								No Data				
162	Ethylene oxide								No Data				
163	Lindane (all isomers)								No Data				
164	Methanol								No Data				
165	Methyl isocyanate								No Data				
166	Methyl methacrylate								No Data				
167	2-Nitropropane								No Data				
168	Pentachloronitrobenzene (Quintobenzene)								No Data				
169	Phosgene °								No Data				

Code Key
Sample Result above the detect limit

Table IDs							IDEM Research			Incoming VOCs as tested		Outgoing VOCs as tested		
ID	Chemical	Sludge	Wastewater	Soil	Oil and Kiln	CAS No.	HAP?	VOC?	DL set to 0	DL set to 0 unless found in outgoing products	Wastewater (DL set to 0)	Soil (DL set to 0)	Oil (DL set to 0)	
		(ug/kg)	(ug/L)	(ug/kg)	(mg/kg)			Yes/No		(ug/kg)	(ug/L)		(ug/kg)	
170	Propionaldehyde								No Data					
171	Propylene oxide								No Data					
172	1,2-Propylenimine (2-Methyl aziridine)								No Data					
173	Styrene oxide								No Data					
174	o-Toluidine								No Data					
175	Triethylamine								No Data					
176	2,2,4-Trimethylpentane								No Data					
177	Vinyl bromide								No Data					

	PTE Based on Max Capacity					
	Incoming		Outgoing			
	DL set to 0	DL set to 0 unless found in outgoing products	Soil (DL set to 0)	Oil (DL set to 0)	Wastewater (DL set to 0)	
sum (ug/kg)	88,130.50	589,130.50	22,988.00	91,568.00		sum (ug/L) (lb/gal)
(lb/ton)	0.18	1.18	4.60E-02	1.83E-01		
					4,060.00	
Max Capacity (tpy)					3.39E-05	
	289,100.00	289,100.00	60.00	21,998.13		
						130,913,368.00
VOCs (lb/yr)	50,956.53	340,631.74	2.76	52,944.07	4,435.65	Max Capacity (gal/yr)
VOCs (tpy)	25.48	170.32	1.38E-03	26.47	2.22	

Notes:

DL = Detect Level

The incoming VOCs were calculated using incoming waste materials (sludge) test dated. The samples were collected in February 2013. When calculating the Incoming VOCs, all non-detect samples and samples that were below the detect level where set to zero.

This is shown in the above tables in the DL set to 0 columns.

The outgoing VOCs were calculated using wastewater, Soil, and Oil test dated. The samples were collected in September 2012, April 2013 and May 2013. For these calculations, the non-detect samples and samples that were below the detect level where set to zero.

This is shown in the above tables under the columns labeled Soil (DL set to 0), Oil (DL set to 0), and Wastewater (DL set to 0).

In some of the samples, a number of chemicals showed up in the outgoing samples that was at a concentration less than the detect level in the incoming sludge. In these cases, the detect level was used to when calculating the incoming VOCs in order to be conservative.

This is shown in the above tables in the DL set to 0 unless found in outgoing products columns.

VOC Worst Case for Individual Tank (D1-D5) (452 turnovers per each tank)		
Number of batches	452.00	batches/yr
Size of largest tanks	17,164.00	gals
Throughput	7,758,128.00	gallons processed per year (largest tank)
	7,758.13	Kgal per year
Emission Factor	170.32	Incoming VOCs (tons/yr)
	26.47	Outgoing VOCs (tons/yr)
	16%	percent remaining in product
	143.84	VOC lost in process (tons/yr)
	2.05E-03	Tons VOC/Kgal
VOC tpy from largest tank	15.94	uncontrolled/unlimited

VOC Worst Case for Heated Tanks not D1-D5 (30 turnovers per each tank)		
Number of batches	30.00	batches/yr
Size of largest tanks	30,079.00	gals
Throughput	902,370.00	gallons processed per year (largest tank)
	902.37	Kgal per year
Emission Factor	170.32	Incoming VOCs (tons/yr)
	26.47	Outgoing VOCs (tons/yr)
	16%	percent remaining in product
	143.84	VOC lost in process (tons/yr)
	2.05E-03	Tons VOC/Kgal
VOC tpy from largest tank	1.85	uncontrolled/unlimited

Notes:

The majority of VOC emissions are expected to occur from the heated production and storage tanks located at the source. Tanks are grouped by the number of turnovers. The potential emission of VOC was then calculated for the tank within the group with the largest capacity, resulting in the maximum possible throughput, and therefore, maximum potential VOC emissions. Prior to consideration of VOC reduction at the scrubber, it resulted in maximum potential VOC emissions of 15.94 tons per year for the tanks with 452 turnovers and 1.85 tons per year for the tanks with 30 turnovers. Therefore, the requirements 326 IAC 8-1-6 (BACT) are not applicable to any tanks.

Number of Batches per year = provided by Metalworking Lubricants Company

Throughput (gals/yr) = Size of tank (gals) x Number of batches (batches/yr)

VOC lost in process (tons/yr) = Incoming VOCs (tons/yr) - Outgoing VOCs (tons/yr)

Emission Factor (tons VOC/Kgal) = VOC lost in process (tons/yr) / 70,000 kgal/yr

PTE from largest tank = Throughput (kgal/yr) x Emission factor (tons VOC/kgal)

Conversion Factors:

2.20E-09 lb/ug

9.07E+02 kg/ton

7.00E+07 gal/yr

7.00E+04 kgal/yr

2.20E-09 lb/ug

3.79E+00 L/gal

8.26E+00 lb/gal

Client: MWL
Project: F1, CFO, KILN
ENVision: 2013-1146
mg/kg - milligrams per kilogram
ppm - parts per million
VOCs - volatile organic compounds

	Sample ID	F1	CFO	KILN	Worst Case
	ENVision #	13-8559	13-8560	13-8561	
	Date Sampled	4/30/13	4/30/13	4/30/13	
	Test Method	8260			
	VOC	mg/kg (ppm)			
1	Acetone	144	141	132	144
2	Acrolein	< 20	< 20	< 20	< 20
3	Acrylonitrile	< 20	< 20	< 20	< 20
4	Benzene	< 1	< 1	< 1	< 1
5	Bromobenzene	< 1	< 1	< 1	< 1
6	Bromochloromethane	< 1	< 1	< 1	< 1
7	Bromodichloromethane	< 1	< 1	< 1	< 1
8	Bromoform	< 1	< 1	< 1	< 1
9	Bromomethane	< 1	< 1	< 1	< 1
10	n-Butanol	< 10	< 10	< 10	< 10
11	2-Butanone (MEK)	< 2	< 2	< 2	< 2
12	n-Butylbenzene	1.89	1.22	0.966	1.888
13	sec-Butylbenzene	1.58	0.606	0.446	1.582
14	tert-Butylbenzene	< 1	< 1	< 1	< 1
15	Carbon Disulfide	< 1	< 1	< 1	< 1
16	Carbon Tetrachloride	< 1	< 1	< 1	< 1
17	Chlorobenzene	< 1	< 1	< 1	< 1
18	Chloroethane	< 1	< 1	< 1	< 1
19	2-Chloroethylvinylether	< 10	< 10	< 10	< 10
20	Chloroform	< 1	< 1	< 1	< 1
21	Chloromethane	< 1	< 1	< 1	< 1
22	2-Chlorotoluene	< 1	< 1	< 1	< 1
23	4-Chlorotoluene	< 1	< 1	< 1	< 1
24	1,2-Dibromo-3-chloropropane	< 1	< 1	< 1	< 1
25	Dibromochloromethane	< 1	< 1	< 1	< 1
26	1,2-Dibromoethane (EDB)	< 1	< 1	< 1	< 1
27	Dibromomethane	< 1	< 1	< 1	< 1
28	1,2-Dichlorobenzene	< 1	< 1	< 1	< 1
29	1,3-Dichlorobenzene	< 1	< 1	< 1	< 1
30	1,4-Dichlorobenzene	< 1	< 1	< 1	< 1
31	trans-1,4-Dichloro-2-butene	< 20	< 20	< 20	< 20
32	Dichlorodifluoromethane	< 1	< 1	< 1	< 1
33	1,1-Dichloroethane	< 1	< 1	< 1	< 1
34	1,2-Dichloroethane	< 1	< 1	< 1	< 1
35	1,1-Dichloroethene	< 1	< 1	< 1	< 1

Client: MWL
Project: F1, CFO, KILN
ENVision: 2013-1146
mg/kg - milligrams per kilogram
ppm - parts per million
VOCs - volatile organic compounds

	Sample ID	F1	CFO	KILN	Worst Case
	ENVision #	13-8559	13-8560	13-8561	
	Date Sampled	4/30/13	4/30/13	4/30/13	
	Test Method	8260			
	VOC	mg/kg (ppm)			
36	cis-1,2-Dichloroethene	< 1	< 1	< 1	< 1
37	trans-1,2-Dichloroethene	< 1	< 1	< 1	< 1
38	1,2-Dichloropropane	< 1	< 1	< 1	< 1
39	1,3-Dichloropropane	< 1	< 1	< 1	< 1
40	2,2-Dichloropropane	< 1	< 1	< 1	< 1
41	1,1-Dichloropropene	< 1	< 1	< 1	< 1
42	cis-1,3-Dichloropropene	< 1	< 1	< 1	< 1
43	trans-1,3-Dichloropropene	< 1	< 1	< 1	< 1
44	Ethylbenzene	1.39	< 1	< 1	1.388
45	Ethyl methacrylate	< 20	< 20	< 20	< 20
46	Hexachloro-1,3-butadiene	< 1	< 1	< 1	< 1
47	n-Hexane	< 2	< 2	< 2	< 2
48	2-Hexanone	< 2	< 2	< 2	< 2
49	Iodomethane	< 2	< 2	< 2	< 2
50	Isopropylbenzene (Cumene)	1.11	0.710	0.644	1.106
51	p-Isopropyltoluene	3.40	1.82	0.840	3.400
52	Methylene chloride	< 4	< 4	< 4	< 4
53	4-Methyl-2-pentanone (MIBK)	< 2	< 2	< 2	< 2
54	Methyl-tert-butyl-ether	< 0.18	< 0.18	< 0.18	< 0.2
55	n-Propylbenzene	1.84	1.02	0.948	1.840
56	Styrene	< 1	< 1	< 1	< 1
57	1,1,1,2-Tetrachloroethane	< 1	< 1	< 1	< 1
58	1,1,2,2-Tetrachloroethane	< 1	< 1	< 1	< 1
59	Tetrachloroethene	< 1	< 1	< 1	< 1
60	Toluene	3.10	< 1	< 1	3.098
61	1,2,3-Trichlorobenzene	4.14	< 1	< 1	4.136
62	1,2,4-Trichlorobenzene	2.20	< 1	< 1	2.198
63	1,1,1-Trichloroethane	< 1	< 1	< 1	< 1
64	1,1,2-Trichloroethane	< 1	< 1	< 1	< 1
65	Trichloroethene	< 1	< 1	< 1	< 1
66	Trichlorofluoromethane	< 1	< 1	< 1	< 1
67	1,2,3-Trichloropropane	< 1	< 1	< 1	< 1
68	1,2,4-Trimethylbenzene	9.14	4.10	3.71	9.138
69	1,3,5-Trimethylbenzene	2.82	1.31	0.896	2.822
70	Vinyl acetate	< 2	< 2	< 2	< 2
71	Vinyl chloride	< 0.40	< 0.40	< 0.40	< 0.4
72	Xylene, M&P	4.20	< 1	< 1	4.198
75	Xylene, Ortho	2.24	< 1	< 1	2.238
76	Xylene, Total	6.44	< 2	< 2	6.436
	Total from VOC 8260 (mg/kg)	189.61	151.79	140.94	189.61
	Total from SVOC 8270 (mg/kg)	40.5	45.1	67.4	45.1
	Total (mg/kg)	230.11	196.89	208.34	234.71

Client: MWL
 Project: F1, CFO, KILN
 ENVision: 2013-1146
mg/kg - milligrams per kilogram
ppm - parts per million
VOCs - volatile organic compounds

Sample ID	F1	CFO	KILN	Worst Case
ENVision #	13-8559	13-8560	13-8561	
Date Sampled	4/30/13	4/30/13	4/30/13	
Test Method	8260			
VOC	mg/kg (ppm)			

PTE Based on Max Capacity		
	Worst Case Oil	KILN
sum (mg/kg)	230.11	208.34
(lb/ton)	4.60E-01	4.17E-01
Max Output (gal/yr) [per MLC]	5,921,434	2,305,825
Density (lb/gal)	7.43	7.70
Max Output (tpy)	21,998.13	8,877.43
VOC (lb/yr)	10,124	3,699
VOC (tpy/yr)	5.06	1.85
	Per IDEM	
Max Output (gal/yr)	5,914,022	2,305,825

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level were set to zero.

Conversion Factors:

2.20E-06 lb/mg
 9.07E+02 kg/ton
 7.00E+07 max gal waste input/yr
 8.45E-02 oil/waste input
 2.83E+07 gal/yr waste input (2012)
 2.39E+06 gal/yr oil produced (2012)
 9.33E+05 gal/yr kiln fuel produced (2012)
 3.29E-02 kiln fuel / waste input

Client: MWL
Project: F1, CFO, KILN
ENVision: 2013-1146
mg/kg - milligrams per kilogram
ppm - parts per million
SVOCs - semi-volatile organic compounds

	Sample ID	F1	CFO	KILN	Worst Case
	ENVision #	13-8559	13-8560	13-8561	
	Date Sampled	4/30/13	4/30/13	4/30/13	
	Test Method	8270 SVOC			
	VOC	mg/kg (ppm)			
78	Acenaphthene	< 140	< 160	< 140	< 160
79	Acenaphthylene	< 140	< 160	< 140	< 160
80	Aniline	< 140	< 160	< 140	< 160
81	Anthracene	< 140	< 160	< 140	< 160
82	Benzo(a)anthracene	< 140	< 160	< 140	< 160
83	Benzo(a)pyrene	< 140	< 160	< 140	< 160
84	Benzo(b)fluoranthene	< 140	< 160	< 140	< 160
85	Benzo(g,h,i)perylene	< 140	< 160	< 140	< 160
86	Benzo(k)fluoranthene	< 140	< 160	< 140	< 160
87	Benzoic Acid	< 700	< 800	< 700	< 800
88	Benzyl Alcohol	< 280	< 320	< 280	< 320
89	4-Bromophenylphenyl ether	< 140	< 160	< 140	< 160
90	Butylbenzylphthalate	< 140	< 160	< 140	< 160
91	Carbazole	< 280	< 320	< 280	< 320
92	4-Chloro-3-methylphenol	< 280	< 320	< 280	< 320
93	4-Chloroaniline	< 280	< 320	< 280	< 320
94	bis(2-Chloroethoxy)methane	< 140	< 160	< 140	< 160
95	bis(2-Chloroethyl)ether	< 140	< 160	< 140	< 160
96	bis(2-Chloroisopropyl)ether	< 140	< 160	< 140	< 160
97	2-Chloronaphthalene	< 140	< 160	< 140	< 160
98	2-Chlorophenol	< 140	< 160	< 140	< 160
99	4-Chlorophenylphenyl ether	< 140	< 160	< 140	< 160
100	Chrysene	< 140	< 160	< 140	< 160
101	Dibenz(a,h)anthracene	< 140	< 160	< 140	< 160
102	Dibenzofuran	< 140	< 160	< 140	< 160
103	1,2-Dichlorobenzene	< 140	< 160	< 140	< 160
104	1,3-Dichlorobenzene	< 140	< 160	< 140	< 160

Reviewer: J Alexander

Client: MWL

Project: F1, CFO, KILN

ENVision: 2013-1146

mg/kg - milligrams per kilogram

ppm - parts per million

SVOCs - semi-volatile organic compounds

	Sample ID	F1	CFO	KILN	Worst Case
	ENVision #	13-8559	13-8560	13-8561	
	Date Sampled	4/30/13	4/30/13	4/30/13	
	Test Method	8270 SVOC			
	VOC	mg/kg (ppm)			
105	1,4-Dichlorobenzene	< 140	< 160	< 140	< 160
106	3,3-Dichlorobenzidine	< 280	< 320	< 280	< 320
107	2,4-Dichlorophenol	< 140	< 160	< 140	< 160
108	Diethylphthalate	< 140	< 160	< 140	< 160
109	2,4-Dimethylphenol	< 140	< 160	< 140	< 160
110	Dimethylphthalate	< 140	< 160	< 140	< 160
111	Di-n-butylphthalate	< 140	< 160	< 140	< 160
112	4,6-Dinitro-2-methylphenol	< 700	< 800	< 700	< 800
113	2,4-Dinitrophenol	< 700	< 800	< 700	< 800
114	2,4-Dinitrotoluene	< 140	< 160	< 140	< 160
115	2,6-Dinitrotoluene	< 140	< 160	< 140	< 160
116	Di-n-octylphthalate	< 140	< 160	< 140	< 160
117	bis(2-Ethylhexyl)phthalate	< 140	< 160	< 140	< 160
118	Fluoranthene	< 140	< 160	< 140	< 160
119	Fluorene	< 140	< 160	< 140	< 160
120	Hexachloro-1,3-butadiene	< 140	< 160	< 140	< 160
121	Hexachlorobenzene	< 140	< 160	< 140	< 160
122	Hexachlorocyclopentadiene	< 140	< 160	< 140	< 160
123	Hexachloroethane	< 140	< 160	< 140	< 160
124	Indeno(1,2,3-cd) pyrene	< 140	< 160	< 140	< 160
125	Isophorone	< 140	< 160	< 140	< 160
126	2-Methylnaphthalene	25.2	26.4	37.7	26.4
127	2-Methylphenol (o-Cresol)	< 140	< 160	< 140	< 160
128	3&4-Methylphenol	< 280	< 320	< 280	< 320
130	Naphthalene	15.3	18.7	29.7	18.7
131	2-Nitroaniline	< 700	< 800	< 700	< 800
132	3-Nitroaniline	< 700	< 800	< 700	< 800
133	4-Nitroaniline	< 700	< 800	< 700	< 800
134	Nitrobenzene	< 140	< 160	< 140	< 160
135	2-Nitrophenol	< 140	< 160	< 140	< 160
136	4-Nitrophenol	< 700	< 800	< 700	< 800
137	N-Nitroso-di-n-propylamine	< 140	< 160	< 140	< 160
138	N-Nitrosodiphenylamine	< 140	< 160	< 140	< 160
139	Pentachlorophenol	< 700	< 800	< 700	< 800
140	Phenanthrene	< 140	< 160	< 140	< 160
141	Phenol	< 140	< 160	< 140	< 160
142	Pyrene	< 140	< 160	< 140	< 160
143	1,2,4-Trichlorobenzene	< 140	< 160	< 140	< 160
144	2,4,5-Trichlorophenol	< 140	< 160	< 140	< 160
145	2,4,6-Trichlorophenol	< 140	< 160	< 140	< 160
	Total HAPs (mg/kg)	40.5	45.1	67.4	45.1

Reviewer: J Alexander

Client: MWL

Project: F1, CFO, KILN

ENVision: 2013-1146

mg/kg - milligrams per kilogram

ppm - parts per million

SVOCs - semi-volatile organic compounds

Sample ID	F1	CFO	KILN	Worst Case
ENVision #	13-8559	13-8560	13-8561	
Date Sampled	4/30/13	4/30/13	4/30/13	
Test Method	8270 SVOC			
VOC	mg/kg (ppm)			
	PTE Based on Max Capacity			
	Worst Case	KILN		
sum (mg/kg)	45.10	67.40		
(lb/ton)	9.02E-02	1.35E-01		
Max Output (gal/yr) [per MLC]	5,921,434	2,305,825		
Density (lb/gal)	7.43	7.70		
Max Output (tpy)	21,998.13	8,877.43		
VOC (lb/yr)	1,984	1,197		
VOC (tpy/yr)	0.99	0.60		
	Per IDEM			
Max Output (gal/yr)	5,914,022	2,305,825		

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level were set to zero.

Conversion Factors:

2.20E-06 lb/mg
9.07E+02 kg/ton
7.00E+07 max gal waste input/yr
8.45E-02 oil/waste input
2.83E+07 gal/yr waste input (2012)
2.39E+06 gal/yr oil produced (2012)
9.33E+05 gal/yr kiln fuel produced (2012)
3.29E-02 kiln fuel / waste input

[illegible]

Client: MWL
Project: 7-SKG
ENVision: 2013-480
ug/kg - micrograms per kilogram
ppb - parts per billion
VOCs - volatile organic compounds

	Sample ID	8	36	10	90	47	51	68	None	85	56	75	SKG	Worst Case
	ENVision #	13-3772	13-3773	13-3774	13-3775	13-3776	13-3777	13-3778	13-3779	13-3780	13-3781	13-3782	13-3783	
	Date Sampled	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	
	Test Method	8260												
	VOC	ug/kg (ppb)												
47	n-Hexane	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	600	600
48	2-Hexanone	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500
49	Iodomethane	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500
50	Isopropylbenzene (Cumene)	< 250	< 250	< 250	< 250	389	< 250	< 250	< 250	< 250	< 250	< 250	444	443.5
51	p-Isopropyltoluene	< 250	255	2,030	1,250	15,800	1,230	< 250	< 250	< 250	< 250	< 250	561	15,800
52	Methylene chloride	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000	< 1000
53	4-Methyl-2-pentanone (MIBK)	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500
54	Methyl-tert-butyl-ether	< 180	< 180	< 180	< 180	< 180	< 180	< 180	< 180	< 180	< 180	< 180	< 180	< 180
55	n-Propylbenzene	< 250	< 250	433	< 250	1,410	573	< 250	< 250	< 250	< 250	< 250	1,360	1,410
56	Styrene	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
57	1,1,1,2-Tetrachloroethane	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
58	1,1,2,2-Tetrachloroethane	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
59	Tetrachloroethene	< 250	< 250	< 250	< 250	1,780	< 250	< 250	< 250	< 250	< 250	< 250	1,650	1,780
60	Toluene	< 250	1,660	9,150	< 250	1,440	4,370	< 250	< 250	< 250	< 250	2,370	22,000	22,000
61	1,2,3-Trichlorobenzene	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
62	1,2,4-Trichlorobenzene	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
63	1,1,1-Trichloroethane	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
64	1,1,2-Trichloroethane	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
65	Trichloroethene	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	878	878
66	Trichlorofluoromethane	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	58,100	58,100
67	1,2,3-Trichloropropane	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250	< 250
68	1,2,4-Trimethylbenzene	828	1,450	3,510	< 250	8,790	4,160	< 250	< 250	< 250	< 250	967	6,650	8,790
69	1,3,5-Trimethylbenzene	< 250	652	1,100	< 250	3,480	1,130	< 250	< 250	< 250	< 250	278	1,820	3,480
70	Vinyl acetate	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500	< 500
71	Vinyl chloride	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100	< 100
72	Xylene, M&P	< 250	1,890	1,180	380	1,730	4,890	< 250	< 250	< 250	< 250	7,710	10,500	10,500
75	Xylene, Ortho	< 250	880	542	< 250	1,010	2,210	< 250	< 250	< 250	< 250	2,200	4,410	4,410
76	Xylene, Total	< 500	2,770	1,720	< 500	2,740	7,100	< 500	< 500	< 500	< 500	9,910	14,900	14,900
	Total from VOC 8260 (ug/kg)	828	11,354	21,043	18,030	46,687	27,631	0	0	0	0	25,525	128,376	164,410
	Total from SVOC 8270 (ug/kg)	0	0	0	0	0	0	0	0	0	0	0	0	0
	Total (ug/kg)	828	11,354	21,043	18,030	46,687	27,631	0	0	0	0	25,525	128,376	164,410

PTE Based on Max Capacity of 70,000,000 gal/yr & 8.26 lb/gal													
Sum (ug/kg)	827.50	11,354.00	21,043.00	18,030.00	46,686.50	27,630.50					25,524.50	128,375.50	164,410.00
(lb/ton)	1.65E-03	2.27E-02	4.21E-02	3.61E-02	9.34E-02	5.53E-02					5.10E-02	2.57E-01	3.29E-01
Max Capacity (tpy)	289,100	289,100	289,100	289,100	289,100	289,100					289,100	289,100	289,100
VOC (lb/yr)	478.46	6,564.82	12,166.94	10,424.84	26,993.86	15,975.79					14,758.11	74,225.95	95,060.88
VOC (tpy)	0.24	3.28	6.08	5.21	13.50	7.99					7.38	37.11	47.53
worst case VOC PTE (per sample) =											37.11		
sum of max VOC PTE (per pollutant) =											47.53		

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level where set to zero.

Conversion Factors:

7.00E+07 gal/yr
7.00E+04 kgal/yr
8.26E+00 lb/gal
2.89E+05 ton/yr
2.20E-09 lb/ug
9.07E+02 kg/ton

Client: MWL

Project: 7-SKG

ENVision: 2013-480

ug/kg - milligrams per kilogram

ppm - parts per million

SVOCs - semi-volatile organic compounds

Sample ID	8	36	10	90	47	51	68	None	85
ENVision #	13-3772	13-3773	13-3774	13-3775	13-3776	13-3777	13-3778	13-3779	13-3780
Date Sampled	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13
Test Method	8270 SVOC								
VOC	ug/kg								
78 Acenaphthene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
79 Acenaphthylene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
80 Aniline	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
81 Anthracene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
82 Benzo(a) anthracene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
83 Benzo(a) pyrene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
84 Benzo(b) fluoranthene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
85 Benzo(g,h,i)perylene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
86 Benzo(k)fluoranthene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
87 Benzoic Acid	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
88 Benzyl Alcohol	< 200	< 200	< 160	< 80	< 160	< 120	< 40	< 200	< 120
89 4-Bromophenylphenyl ether	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
90 Butylbenzylphthalate	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
91 Carbazole	< 200	< 200	< 160	< 80	< 160	< 120	< 40	< 200	< 120
92 4-Chloro-3-methylphenol	< 200	< 200	< 160	< 80	< 160	< 120	< 40	< 200	< 120
93 4-Chloroaniline	< 200	< 200	< 160	< 80	< 160	< 120	< 40	< 200	< 120
94 bis(2-Chloroethoxy) methane	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
95 bis(2-Chloroethyl) ether	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
96 bis(2-Chloroisopropyl) ether	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
97 2-Chloronaphthalene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
98 2-Chlorophenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
99 4-Chlorophenylphenyl ether	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
100 Chrysene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
101 Dibenzo(a,h) anthracene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
102 Dibenzofuran	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
103 1,2-Dichlorobenzene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
104 1,3-Dichlorobenzene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
105 1,4-Dichlorobenzene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
106 3,3-Dichlorobenzidine	< 200	< 200	< 160	< 80	< 160	< 120	< 40	< 200	< 120
107 2,4-Dichlorophenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
108 Diethylphthalate	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60

Reviewer: J Alexander

Client: MWL

Project: 7-SKG

ENVision: 2013-480

ug/kg - milligrams per kilogram

ppm - parts per million

SVOCs - semi-volatile organic compounds

Sample ID		8	36	10	90	47	51	68	None	85
ENVision #		13-3772	13-3773	13-3774	13-3775	13-3776	13-3777	13-3778	13-3779	13-3780
Date Sampled		2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13
Test Method		8270 SVOC								
VOC		ug/kg								
109	2,4-Dimethylphenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
110	Dimethylphthalate	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
111	Di-n-butylphthalate	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
112	4,6-Dinitro-2-methylphenol	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
113	2,4-Dinitrophenol	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
114	2,4-Dinitrotoluene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
115	2,6-Dinitrotoluene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
116	Di-n-octylphthalate	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
117	bis(2-Ethylhexyl)phthalate	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60

Reviewer: J Alexander

Client: MWL

Project: 7-SKG

ENVision: 2013-480

ug/kg - milligrams per kilogram

ppm - parts per million

SVOCs - semi-volatile organic compounds

Sample ID	8	36	10	90	47	51	68	None	85
ENVision #	13-3772	13-3773	13-3774	13-3775	13-3776	13-3777	13-3778	13-3779	13-3780
Date Sampled	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13	2/21/13
Test Method	8270 SVOC								
VOC	ug/kg								
118 Fluoranthene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
119 Fluorene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
120 Hexachloro-1,3-butadiene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
121 Hexachlorobenzene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
122 Hexachlorocyclopentadiene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
123 Hexachloroethane	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
124 Indeno(1,2,3-cd) pyrene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
125 Isophorone	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
126 2-Methylnaphthalene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
127 2-Methylphenol (o-Cresol)	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
128 3&4-Methylphenol	< 200	< 200	< 160	< 80	< 160	< 120	< 40	< 200	< 120
130 Naphthalene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
131 2-Nitroaniline	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
132 3-Nitroaniline	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
133 4-Nitroaniline	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
134 Nitrobenzene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
135 2-Nitrophenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
136 4-Nitrophenol	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
137 N-Nitroso-di-n-propylamine	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
138 N-Nitrosodiphenylamine	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
139 Pentachlorophenol	< 500	< 500	< 400	< 200	< 400	< 300	< 100	< 500	< 300
140 Phenanthrene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
141 Phenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
142 Pyrene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
143 1,2,4-Trichlorobenzene	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
144 2,4,5-Trichlorophenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60
145 2,4,6-Trichlorophenol	< 100	< 100	< 80	< 40	< 80	< 60	< 20	< 100	< 60

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level where set to zero.

All the above compounds are found in the samples below the detect level. The detect level has been set to zero and no SVOC were calculated.

56	75	SKG	Worst Case
13-3781	13-3782	13-3783	
2/21/13	2/21/13	2/21/13	
< 20	< 40	< 20	< 100
< 20	< 40	< 20	< 100
< 20	< 40	< 20	< 100
< 100	< 200	< 100	< 500
< 100	< 200	< 100	< 500
< 20	< 40	< 20	< 100
< 20	< 40	< 20	< 100
< 20	< 40	< 20	< 100
< 20	< 40	< 20	< 100

Client: MWL
 Project: QUARTERLY
 ENVision: 2013-633
ug/kg - micrograms per kilogram
ppm - parts per million
VOCs - volatile organic compounds

	Sample ID	W-8
	ENVision #	13-4826
	Date Sampled	3/12/2013
	Test Method	8260
	VOC	ug/kg (ppm)
1	Acetone	< 5000
2	Acrolein	< 5000
3	Acrylonitrile	< 5000
4	Benzene	347
5	Bromobenzene	< 250
6	Bromochloromethane	< 250
7	Bromodichloromethane	< 250
8	Bromoform	< 250
9	Bromomethane	< 250
10	n-Butanol	< 2500
11	2-Butanone (MEK)	< 500
12	n-Butylbenzene	405
13	sec-Butylbenzene	261
14	tert-Butylbenzene	< 250
15	Carbon Disulfide	< 250
16	Carbon Tetrachloride	< 250
17	Chlorobenzene	< 250
18	Chloroethane	< 250
19	2-Chloroethylvinylether	< 2500
20	Chloroform	< 250
21	Chloromethane	< 250
22	2-Chlorotoluene	< 250
23	4-Chlorotoluene	< 250
24	1,2-Dibromo-3-chloropropane	< 250
25	Dibromochloromethane	< 250
26	1,2-Dibromoethane (EDB)	< 250
27	Dibromomethane	< 250
28	1,2-Dichlorobenzene	< 250
29	1,3-Dichlorobenzene	< 250
30	1,4-Dichlorobenzene	< 250
31	trans-1,4-Dichloro-2-butene	< 5000
32	Dichlorodifluoromethane	< 250
33	1,1-Dichloroethane	< 250
34	1,2-Dichloroethane	< 250
35	1,1-Dichloroethene	< 250
36	cis-1,2-Dichloroethene	< 250
37	trans-1,2-Dichloroethene	< 250
38	1,2-Dichloropropane	< 250

Client: MWL
 Project: QUARTERLY
 ENVision: 2013-633
ug/kg - micrograms per kilogram
ppm - parts per million
VOCs - volatile organic compounds

	Sample ID	W-8
	ENVision #	13-4826
	Date Sampled	3/12/2013
	Test Method	8260
	VOC	ug/kg (ppm)
39	1,3-Dichloropropane	< 250
40	2,2-Dichloropropane	< 250
41	1,1-Dichloropropene	< 250
42	cis-1,3-Dichloropropene	< 250
43	trans-1,3-Dichloropropene	< 250
44	Ethylbenzene	1,170
45	Ethyl methacrylate	< 5000
46	Hexachloro-1,3-butadiene	< 250
47	n-Hexane	< 500
48	2-Hexanone	< 500
49	Iodomethane	< 500
50	Isopropylbenzene (Cumene)	< 250
51	p-Isopropyltoluene	569
52	Methylene chloride	< 250
53	4-Methyl-2-pentanone (MIBK)	< 500
54	Methyl-tert-butyl-ether	< 180
55	n-Propylbenzene	597
56	Styrene	< 250
57	1, 1, 1, 2-Tetrachloroethane	< 250
58	1, 1, 2, 2-Tetrachloroethane	< 250
59	Tetrachloroethene	257
60	Toluene	6,610
61	1, 2, 3-Trichlorobenzene	< 250
62	1, 2, 4-Trichlorobenzene	< 250
63	1, 1, 1- Trichloroethane	< 250
64	1, 1, 2-Trichloroethane	< 250
65	Trichloroethene	400
66	Trichlorofluoromethane	< 250
67	1, 2, 3-Trichloropropane	< 250
68	1,2,4-Trimethylbenzene	3,400
69	1,3,5-Trimethylbenzene	1,390
70	Vinyl acetate	< 500
71	Vinyl chloride	< 100

Client: MWL
 Project: QUARTERLY
 ENVision: 2013-633
ug/kg - micrograms per kilogram
ppm - parts per million
VOCs - volatile organic compounds

	Sample ID	W-8
	ENVision #	13-4826
	Date Sampled	3/12/2013
	Test Method	8260
	VOC	ug/kg (ppm)
72	Xylene, M&P	2,780
75	Xylene, Ortho	1,140
76	Xylene, Total	3,920
	Total from VOC 8260 (ug/kg)	23,245
	Total from SVOC 8270 (mg/kg)	0
	Total (ug/kg)	23,245.00

PTE Based on Max Capacity of 60 tons/yr

	W-8
sum (ug/kg)	23,245.00
(lb/ton)	4.65E-02
Max Capacity (ton/yr)	60.0
VOC (lb/yr)	2.79
VOC (tpy)	1.39E-03

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level were set to zero.

Conversion Factors:

2.20E-09 lb/ug
 9.07E+02 kg/ton

Client: MWL
Project: QUARTERLY
ENVision: 2013-633
mg/kg - milligrams per kilogram
ppm - parts per million
SVOCs - semi-volatile organic compounds

Sample ID		W-8
ENVision #		13-4826
Date Sampled		3/12/2013
Test Method		8270 SVOC
VOC		mg/kg (ppm)
78	Acenaphthene	< 30
79	Acenaphthylene	< 30
80	Aniline	< 30
81	Anthracene	< 30
82	Benzo(a)anthracene	< 30
83	Benzo(a)pyrene	< 30
84	Benzo(b)fluoranthene	< 30
85	Benzo(g,h,i)perylene	< 30
86	Benzo(k)fluoranthene	< 30
87	Benzoic Acid	< 150
88	Benzyl Alcohol	< 60
89	4-Bromophenylphenyl ether	< 30
90	Butylbenzylphthalate	< 30
91	Carbazole	< 60
92	4-Chloro-3-methylphenol	< 60
93	4-Chloroaniline	< 60
94	bis(2-Chloroethoxy)methane	< 30
95	bis(2-Chloroethyl)ether	< 30
96	bis(2-Chloroisopropyl)ether	< 30
97	2-Chloronaphthalene	< 30
98	2-Chlorophenol	< 30
99	4-Chlorophenylphenyl ether	< 30
100	Chrysene	< 30
101	Dibenzo(a,h)anthracene	< 30
102	Dibenzofuran	< 30
103	1,2-Dichlorobenzene	< 30
104	1,3-Dichlorobenzene	< 30
105	1,4-Dichlorobenzene	< 30
106	3,3-Dichlorobenzidine	< 60
107	2,4-Dichlorophenol	< 30
108	Diethylphthalate	< 30
109	2,4-Dimethylphenol	< 30
110	Dimethylphthalate	< 30
111	Di-n-butylphthalate	< 30
112	4,6-Dinitro-2-methylphenol	< 150
113	2,4-Dinitrophenol	< 150
114	2,4-Dinitrotoluene	< 30
115	2,6-Dinitrotoluene	< 30

Client: MWL
 Project: QUARTERLY
 ENVision: 2013-633
mg/kg - milligrams per kilogram
ppm - parts per million
SVOCs - semi-volatile organic compounds

	Sample ID	W-8
	ENVision #	13-4826
	Date Sampled	3/12/2013
	Test Method	8270 SVOC
	VOC	mg/kg (ppm)
116	Di-n-octylphthalate	< 30
117	bis(2-Ethylhexyl)phthalate	< 30
118	Fluoranthene	< 30
119	Fluorene	< 30
120	Hexachloro-1,3-butadiene	< 30
121	Hexachlorobenzene	< 30
122	Hexachlorocyclopentadiene	< 30
123	Hexachloroethane	< 30
124	Indeno(1,2,3-cd) pyrene	< 30
125	Isophorone	< 30
126	2-Methylnaphthalene	< 30
127	2-Methylphenol (o-Cresol)	< 30
128	3&4-Methylphenol	< 60
129	4-Methylphenol	No data
130	Naphthalene	< 30
131	2-Nitroaniline	< 150
132	3-Nitroaniline	< 150
133	4-Nitroaniline	< 150
134	Nitrobenzene	< 30
135	2-Nitrophenol	< 30
136	4-Nitrophenol	< 150
137	N-Nitroso-di-n-propylamine	< 30
138	N-Nitrosodiphenylamine	< 30
139	Pentachlorophenol	< 150
140	Phenanthrene	< 30
141	Phenol	< 30
142	Pyrene	< 30
143	1,2,4-Trichlorobenzene	< 30
144	2,4,5-Trichlorophenol	< 30
145	2,4,6-Trichlorophenol	< 30

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level were set to zero.

All the above compounds are found in the samples below the detect level.

The detect level has been set to zero and no SVOC were calculated.

Client: MWL
 Project: WASTEWATER
 ENVision: 2013-1240
ug/L - micrograms per liter
ppb - parts per billion
VOCs - volatile organic compounds

Sample ID		EFFLUENT
ENVision #		2013-1240
Date Sampled		5/8/2013
Test Method		8260
VOC		ug/L (ppb)
1	Acetone	31,600
2	Acrolein	< 1000
3	Acrylonitrile	< 1000
4	Benzene	< 5
5	Bromobenzene	< 50
6	Bromochloromethane	< 50
7	Bromodichloromethane	< 50
8	Bromoform	< 50
9	Bromomethane	< 50
10	n-Butanol	< 500
11	2-Butanone (MEK)	< 100
12	n-Butylbenzene	< 50
13	sec-Butylbenzene	< 50
14	tert-Butylbenzene	< 50
15	Carbon Disulfide	< 50
16	Carbon Tetrachloride	< 50
17	Chlorobenzene	< 50
18	Chloroethane	< 50
19	2-Chloroethylvinylether	< 500
20	Chloroform	148
21	Chloromethane	< 50
22	2-Chlorotoluene	< 50
23	4-Chlorotoluene	< 50
24	1,2-Dibromo-3-chloropropane	< 50
25	Dibromochloromethane	< 50
26	1,2-Dibromoethane (EDB)	< 50
27	Dibromomethane	< 50
28	1,2-Dichlorobenzene	< 50
29	1,3-Dichlorobenzene	< 50
30	1,4-Dichlorobenzene	< 50
31	trans-1,4-Dichloro-2-butene	< 1000
32	Dichlorodifluoromethane	< 50
33	1,1-Dichloroethane	< 50
34	1,2-Dichloroethane	< 50
35	1,1-Dichloroethene	< 50
36	cis-1,2-Dichloroethene	< 50
37	trans-1,2-Dichloroethene	< 50
38	1,2-Dichloropropane	< 50
39	1,3-Dichloropropane	< 50

Client: MWL
 Project: WASTEWATER
 ENVision: 2013-1240
ug/L - micrograms per liter
ppb - parts per billion
VOCs - volatile organic compounds

	Sample ID	EFFLUENT
	ENVision #	2013-1240
	Date Sampled	5/8/2013
	Test Method	8260
	VOC	ug/L (ppb)
40	2,2-Dichloropropane	< 50
41	1,1-Dichloropropene	< 50
42	cis-1,3-Dichloropropene	< 50
43	trans-1,3-Dichloropropene	< 50
44	Ethylbenzene	< 50
45	Ethyl methacrylate	< 1000
46	Hexachloro-1,3-butadiene	< 50
47	n-Hexane	< 100
48	2-Hexanone	< 100
49	Iodomethane	< 100
50	Isopropylbenzene (Cumene)	< 50
51	p-Isopropyltoluene	< 50
52	Methylene chloride	< 50
53	4-Methyl-2-pentanone (MIBK)	< 100
54	Methyl-tert-butyl-ether	< 40
	Naphthalene	< 50
55	n-Propylbenzene	< 50
56	Styrene	< 50
57	1,1,1,2-Tetrachloroethane	< 50
58	1,1,2,2-Tetrachloroethane	< 50
59	Tetrachloroethene	< 50
60	Toluene	102
61	1,2,3-Trichlorobenzene	< 50
62	1,2,4-Trichlorobenzene	< 50
63	1,1,1-Trichloroethane	< 50
64	1,1,2-Trichloroethane	< 50
65	Trichloroethene	< 50
66	Trichlorofluoromethane	< 50
67	1,2,3-Trichloropropane	< 50
68	1,2,4-Trimethylbenzene	< 50
69	1,3,5-Trimethylbenzene	< 50

Client: MWL
 Project: WASTEWATER
 ENVision: 2013-1240
ug/L - micrograms per liter
ppb - parts per billion
VOCs - volatile organic compounds

	Sample ID	EFFLUENT
	ENVision #	2013-1240
	Date Sampled	5/8/2013
	Test Method	8260
	VOC	ug/L (ppb)
70	Vinyl acetate	< 100
71	Vinyl chloride	< 20
72	Xylene, M&P	< 50
75	Xylene, Ortho	< 50
76	Xylene (Total)	< 100
	Total from VOC 8260 (ug/L)	31,850
	Total from SVOC 8270 (ug/L)	3,810
	Total (ug/L)	35,660

PTE Max Capacity	
	EFFLUENT
sum (ug/L)	35,660
(lb/gal)	2.98E-04
Max Effluent (gal/yr)	1.31E+08
VOC (lb/yr)	38,959.44
VOC (tpy)	19.48

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level where set to zero.

Conversion Factors:

1.31E+08 gal/yr
 8.34E+00 lb/gal
 5.46E+05 ton/yr
 2.20E-09 lb/ug
 3.79E+00 L/gal

Client: MWL
 Project: WASTEWATER
 ENVision: 2013-1240
ug/L - micrograms per liter
ppb - parts per billion

Sample ID	EFFLUENT
ENVision #	2013-1240
Date Sampled	5/8/2013
Test Method	8270
VOC	ug/L (ppb)
Acenaphthene	< 300
Acenaphthylene	< 300
Aniline	< 300
Anthracene	< 300
Benzo(a)anthracene	< 300
Benzo(a)pyrene	< 300
Benzo(b)fluoranthene	< 300
Benzo(g,h,i)perylene	< 300
Benzo(k)fluoranthene	< 300
Benzoic Acid	< 1200
Benzyl Alcohol	720
4-Bromophenylphenyl ether	< 300
Butylbenzylphthalate	< 300
Carbazole	< 600
4-Chloro-3-methylphenol	< 600
4-Chloroaniline	< 600
bis(2-Chloroethoxy)methane	< 300
bis(2-Chloroethyl)ether	< 300
bis(2-Chloroisopropyl)ether	< 300
2-Chloronaphthalene	< 300
2-Chlorophenol	< 300
4-Chlorophenylphenyl ether	< 300
Chrysene	< 300
Dibenzo(a,h)anthracene	< 300
Dibenzofuran	< 300
1,2-Dichlorobenzene	< 300
1,3-Dichlorobenzene	< 300
1,4-Dichlorobenzene	< 300
3,3-Dichlorobenzidine	< 600
2,4-Dichlorophenol	< 300
Diethylphthalate	< 300
2,4-Dimethylphenol	< 300
Dimethylphthalate	< 300
Di-n-butylphthalate	< 300
4,6-Dinitro-2-methylphenol	< 1200
2,4-Dinitrophenol	< 1200
2,4-Dinitrotoluene	< 300
2,6-Dinitrotoluene	< 300
Di-n-octylphthalate	< 300
bis(2-Ethylhexyl)phthalate	< 150
Fluoranthene	< 300
Fluorene	< 300

Hexachloro-1,3-butadiene	< 300
Hexachlorobenzene	< 150
Hexachlorocyclopentadiene	< 600
Hexachloroethane	< 300
Indeno(1,2,3-cd)pyrene	< 300
Isophorone	< 300
2-Methylnaphthalene	< 300
2-Methylphenol (o-Cresol)	< 300
3&4-Methylphenol	< 600
Naphthalene	< 150
2-Nitroaniline	< 1200
3-Nitroaniline	< 1200
4-Nitroaniline	< 1200
Nitrobenzene	< 300
2-Nitrophenol	< 300
4-Nitrophenol	< 1200
N-Nitroso-di-n-propylamine	< 300
N-Nitrosodiphenylamine	< 300
Pentachlorophenol	< 1200
Phenanthrene	< 300
Phenol	3090
Pyrene	< 300
1,2,4-Trichlorobenzene	< 300
2,4,5-Trichlorophenol	< 300
2,4,6-Trichlorophenol	< 300
Total from SVOC 8270 (ug/L)	3810

PTE Max Capacity	
EFFLUENT	
sum (ug/L)	3,810
(lb/gal)	3.18E-05
Max Effluent (gal/yr)	1.31E+08
VOC (lb/yr)	4,162.52
VOC (tpy)	2.08

Notes:

DL = Detect Level

When calculating the VOCs, all non-detect samples and samples that were below the detect level were set to zero.

Conversion Factors:

1.31E+08 gal/yr
 8.34E+00 lb/gal
 5.46E+05 ton/yr
 2.20E-09 lb/ug
 3.79E+00 L/gal

Indiana Department of Environmental Management
Office of Air Quality

Technical Support Document (TSD) for a
Federally Enforceable State Operating Permit Renewal

Source Background and Description

Source Name:	Metalworking Lubricants Company
Source Location:	1509 South Senate Avenue, Indianapolis, IN 46225
County:	Marion
SIC Code:	2992
Permit Renewal No.:	F097-32513-00139
Permit Reviewer:	Julie Alexander

The Office of Air Quality (OAQ) has reviewed the operating permit renewal application from Metalworking Lubricants Company relating to the operation of a stationary waste oil recycling plant. On November 14, 2012, Metalworking Lubricants Company submitted an application to the OAQ requesting to renew its operating permit. Metalworking Lubricants Company was issued its first FESOP Renewal F091-15365-00139 on October 27, 2003.

Permitted Emission Units and Pollution Control Equipment

The source consists of the following permitted emission units:

- (a) 350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas fired, identified as Emission Unit ID #1.
- (b) 600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas fired, identified as Emission Unit ID #2.
- (c) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
P1	14,055	June 2010	Steam Injection
P2	21,698	June 2010	Steam Injection
P3	21,698	1996	Steam Injection
P4	21,698	June 2010	Steam Injection
P5	21,698	June 2010	Steam Injection
P6	21,698	June 2010	Steam Injection
P7	21,698	June 2010	Steam Injection
P8	21,698	June 2010	Steam Injection
P9	21,698	March 2013	Steam Injection
P10	30,079	1996	Steam Injection
P11	30,079	1996	Steam Injection
P12	30,079	1996	Steam Injection
P13	30,079	1996	Steam Injection
P14	21,018	July 2003	Steam Injection
P15	21,536	July 2003	Steam Injection

- (d) Heated Product tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
D1	12,034	2005	Heat Exchanger
D2	11,664	1996	Heat Exchanger
D3	11,134	1996	Heat Exchanger
D4	17,164	1996	Heat Exchanger
D5	17,164	2001	Heat Exchanger

- (e) Heated Waste Water tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
FET2	Outdoor	22,022	1996	Steam Injection
FET3	Outdoor	20,402	1996	Steam Injection
FET4	Outdoor	17,488	1996	Steam Injection

- (f) One (1) Sodium Bi-sulfite Scrubber, constructed in 1980, exhausting to stack S-01.

Insignificant Activities

The source also consists of the following insignificant activities:

- (a) Natural gas-fired combustion sources with heat input equal to or less than ten (10) million Btu per hour:
- (1) Unit Heater - Maintenance, 0.130 MMBtu/hr.
 - (2) Storage Heater - Maintenance, 0.175 MMBtu/hr.
 - (3) Unit Heater 1 - Blending, 0.175 MMBtu/hr.
 - (4) Unit Heater 2 - Blending, 0.175 MMBtu/hr.;
 - (5) Unit Heater 3 - Blending, 0.175 MMBtu/hr.
 - (6) Make-up Unit - Blending, 0.175 MMBtu/hr.
 - (7) Unit Heater 1 - Water Treatment, 0.400 MMBtu/hr.
 - (8) Unit Heater 2 - Water Treatment, 0.130 MMBtu/hr.
 - (9) Unit Heater 3 - Water Treatment, 0.130 MMBtu/hr.;
 - (10) Make-up Unit - Water Treatment, 0.985 MMcf/hr.
 - (11) Individual Water Heater (temp.), 0.150 MMBtu/hr.
 - (12) Space Heater 1 - Office, 0.115 MMBtu/hr.
 - (13) Space Heater 2 - Office, 0.115 MMBtu/hr.;

(14) Space Heater 3 - Office, 0.130 MMBtu/hr..

Unpermitted Emission Units and Pollution Control Equipment

The source consists of the following unpermitted emission unit(s):

- (a) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
SHT2	21,995	June 1991	Steam Injection

- (b) Heated Water tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
W8	25,908	1996	Steam Injection

- (c) Heated Product tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
K1	14,381	June 2012	Heat Exchanger
K2	16,073	July 2012	Heat Exchanger
K3	23,512	June 2011	Heat Exchanger

- (d) Heated Incoming Water Oil tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
W2	Outdoor	19,431	1996	Steam Injection
W3	Outdoor	17,842	1996	Steam Injection
W4	Outdoor	21,995	1996	Steam Injection
W5	Outdoor	21,995	1996	Steam Injection
W6	Outdoor	21,995	1996	Steam Injection
W7	Outdoor	21,995	1996	Steam Injection

- (e) Heated Oil/Water separation tank venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
Big Pit	Indoor	60,000	pre-1993	Steam Injection

- (f) Heated Oil tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
M1	Indoor	1,151	1992	Heat Exchanger
M2	Indoor	7,637	January 2013	Heat Exchanger
M3	Indoor	6,175	1992	Heat Exchanger

M4	Indoor	7,637	1992	Heat Exchanger
M5	Indoor	7,637	1992	Heat Exchanger

- (i) Heated Blending and Storage tanks, blending of final product streams, venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
B10	Outdoor	15,545	pre-1993	Heat Exchanger
B14	Outdoor	11,848	pre-1993	Heat Exchanger
B19	Outdoor	18,459	pre-1993	Heat Exchanger
B20	Outdoor	11,335	pre-1993	Heat Exchanger
B26	Outdoor	18,349	pre-1993	Heat Exchanger
B27	Outdoor	19,055	pre-1993	Heat Exchanger
B28	Outdoor	20,292	pre-1993	Heat Exchanger
B31	Outdoor	10,636	pre-1993	Heat Exchanger
B32	Outdoor	27,970	pre-1993	Heat Exchanger
B33	Outdoor	27,970	pre-1993	Heat Exchanger
B34	Outdoor	26,504	pre-1993	Heat Exchanger
B36	Outdoor	29,609	pre-1993	Heat Exchanger
B37	Outdoor	26,504	pre-1993	Heat Exchanger
B42	Outdoor	7,753	pre-1993	Heat Exchanger
B44	Outdoor	19,159	pre-1993	Heat Exchanger
B45	Outdoor	4,505	pre-1993	Heat Exchanger
B50	Outdoor	10,363	pre-1993	Heat Exchanger

- (j) Unheated tanks for blending and storage of final product, venting to the atmosphere:

Tank	Vent to:	Size	Year Installed
B1	Outdoor	13,107	pre-1993
B11	Outdoor	4,505	pre-1993
B12	Outdoor	4,505	pre-1993
B13	Outdoor	4,505	pre-1993
B15	Outdoor	19,431	pre-1993
B16	Outdoor	16,075	pre-1993
B17	Outdoor	18,459	pre-1993
B18	Outdoor	18,459	pre-1993
B2	Outdoor	19,159	pre-1993
B21	Outdoor	5,710	pre-1993
B22	Outdoor	5,076	pre-1993
B23	Outdoor	5,076	pre-1993
B24	Outdoor	10,583	pre-1993
B25	Outdoor	18,897	pre-1993
B29	Outdoor	8,054	pre-1993

Tank	Vent to:	Size	Year Installed
B3	Outdoor	19,159	pre-1993
B30	Outdoor	9,198	pre-1993
B35	Outdoor	29,609	pre-1993
B38	Outdoor	29,609	pre-1993
B39	Outdoor	29,609	pre-1993
B4	Outdoor	30,079	pre-1993
B40	Outdoor	7,010	pre-1993
B41	Outdoor	8,662	pre-1993
B43	Outdoor	7,423	pre-1993
B46	Outdoor	21,995	pre-1993
B47	Outdoor	25,702	1996
B48	Outdoor	18,135	1996
B49	Outdoor	20,079	pre-1993
B50	Outdoor	19,107	pre-1993
B51	Outdoor	20,351	pre-1993
B52	Outdoor	30,455	pre-1993
B53	Outdoor	2,133	1993
B54	Outdoor	2,133	1993
B55	Outdoor	2,133	1993
B6	Outdoor	18,459	pre-1993
B7	Outdoor	19,755	pre-1993
B8	Outdoor	20,726	pre-1993
B9	Outdoor	19,159	pre-1993
B99	Outdoor	10,000	pre-1993

(k) Unheated Waste Water tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
A4	Outdoor	14,102	April 1997
C2	Outdoor	12,925	October 1992
C3	Outdoor	12,925	October 1992
FET1	Indoor	15,545	2003
Small Pit	Indoor	10,854	October 1993
Small Pit	Indoor	10,854	October 1993

(l) Unheated Additive Storage tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
Acid	Indoor	5,922	1996
Alum1	Indoor	5,264	2001
Alum2	Indoor	4,136	2001
Caustic	Indoor	6,862	1996

Coagulent	Indoor	7,520	2001
Polymer	Indoor	7,637	2001

- (m) Unheated Product Storage tank venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
SHT1	Indoor	11,497	2000

- (n) Unheated Waste Oil Storage tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
ST10	Outdoor	30,079	1996
ST11	Outdoor	20,079	1996
ST13	Outdoor	11,658	1996
ST14	Outdoor	15,545	1996
ST3	Outdoor	21,374	1996
ST42	Outdoor	42,297	1996
ST5	Outdoor	25,908	1996
ST6	Outdoor	25,908	1996
ST9	Outdoor	19,431	1996

Unpermitted Insignificant Activities

The source also consists of the following insignificant activities:

- (a) One (1) portable air compressor with a maximum capacity of 5.5 HP, constructed in 2011.
- (b) One (1) diesel fired salamander, with a maximum capacity of 0.4 MMBtu/hr, constructed in 2005.
- (c) One (1) portable power washer with a diesel water heater, identified as Power Washer #1, with a maximum capacity of 0.4 MMBtu/hr, constructed in 1997.
- (d) One (1) portable power washer with a diesel water heater, identified as Power Washer #2, with a maximum capacity of 0.4 MMBtu/hr constructed in 2012.
- (e) Petroleum fuel dispensing facility, having a storage capacity of less than 10,500 gallons;
- (f) Vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids;
- (g) Activities associated with the treatment of wastewater streams with an oil and grease content less than or equal to one percent (1%) by volume;
- (h) Paved and unpaved roads and parking lots with public access;
- (i) Equipment used to collect any material that might be released during a malfunction, process upset, or spill cleanup, including catch tanks, temporary liquid separators, tanks, and fluid handling equipment;
- (j) Blowdown for any of the following: sight glasses, boilers, compressors, pumps;

- (k) A laboratory as defined in 326 IAC 2-7-1(21)(D), utilizing Freon (CFC 113) used in lab and recovered for reuse;
- (l) One (1) oxygen-acetylene cutting torch, identified as torch cutting operation, with a maximum capacity of 24 in/minute.
- (m) Three (3) welding stations with a maximum capacity of 310 lbs/yr.
 - (1) One (1) Miller Thunderbolt Stick welding station, identified as Welding Station #1, constructed in 1998.
 - (2) One (1) Miller Trailblazer Stick welding station powered by a 16 HP engine, identified as Welding Station #2, constructed in 1998.
 - (3) One (1) Lincoln Electric Weldanpower 225 G7 Stick welding station powered by a 16 HP engine, identified as Welding Station #3, constructed in 1993.

Existing Approvals

Since the issuance of the FESOP F097-32513-00139 on October 27, 2003, the source has constructed or has been operating under the following additional approvals:

- (a) Administrative Amendment No.: 097-19516-00139 issued on May 19, 2005
- (b) Significant Permit Revision No.: 097-22105-00139 issued on April 17, 2007
- (c) Administrative Amendment No.: 097-26009-00139 issued on February 7, 2008

All terms and conditions of previous permits issued pursuant to permitting programs approved into the State Implementation Plan have been either incorporated as originally stated, revised, or deleted by this permit. All previous registrations and permits are superseded by this permit.

Enforcement Issue

IDEM, OAQ is aware that equipment may have been constructed and/or operated prior to receipt of the proper permit. The subject equipment is listed in this Technical Support Document under "Unpermitted Emission Units and Pollution Control Equipment" and "Unpermitted Insignificant Activities". IDEM, OAQ is reviewing this matter and will take the appropriate action. This proposed permit is intended to satisfy the requirements of the construction permit rules.

Emission Calculations

See Appendix A of this document for detailed emission calculations.

County Attainment Status

The source is located in Marion County.

Pollutant	Designation
SO ₂	Non-attainment effective October 4, 2013, for the Center Township, Perry Township, and Wayne Township. Better than national standards for the remainder of the county.
CO	Attainment effective February 18, 2000, for the part of the city of Indianapolis bounded by 11 th Street on the north; Capitol Avenue on the west; Georgia Street on the south; and Delaware Street on the east. Unclassifiable or attainment effective November 15, 1990, for the remainder of Indianapolis and Marion County.
O ₃	Unclassifiable or attainment effective July 20, 2012, for the 2008 8-hour ozone standard. ¹
PM _{2.5}	Attainment effective July 11, 2013, for the annual PM _{2.5} standard.
PM _{2.5}	Unclassifiable or attainment effective December 13, 2009, for the 24-hour PM _{2.5} standard.
PM ₁₀	Unclassifiable effective November 15, 1990.
NO ₂	Cannot be classified or better than national standards.
Pb	Unclassifiable or attainment effective December 31, 2011.
¹ Attainment effective October 18, 2000, for the 1-hour ozone standard for the Indianapolis area, including Marion County, and is a maintenance area for the 1-hour ozone National Ambient Air Quality Standards (NAAQS) for purposes of 40 CFR 51, Subpart X*. The 1-hour designation was revoked effective June 15, 2005.	

- (a) Ozone Standards
Volatile organic compounds (VOC) and Nitrogen Oxides (NO_x) are regulated under the Clean Air Act (CAA) for the purposes of attaining and maintaining the National Ambient Air Quality Standards (NAAQS) for ozone. Therefore, VOC and NO_x emissions are considered when evaluating the rule applicability relating to ozone. Marion County has been designated as attainment or unclassifiable for ozone. Therefore, VOC and NO_x emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (b) PM_{2.5}
Marion County has been classified as attainment for PM_{2.5}. Therefore, direct PM_{2.5}, SO₂, and NO_x emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (c) SO₂
U.S. EPA, in the Federal Register Notice 78 FR 47191 dated August 5, 2013, has designated Marion County Center Township as nonattainment for SO₂. Therefore, SO₂ emissions were reviewed pursuant to the requirements of Emission Offset, 326 IAC 2-3.
- (d) Other Criteria Pollutants
Marion County has been classified as attainment or unclassifiable in Indiana for all other regulated pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.

Fugitive Emissions

Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2, 326 IAC 2-3, or 326 IAC 2-7, and there is no applicable New Source Performance Standard that was in effect on August 7, 1980, fugitive emissions are not counted toward the determination of PSD, Emission Offset, and Part 70 Permit applicability.

Unrestricted Potential Emissions

This table reflects the unrestricted potential emissions of the source.

Unrestricted Potential Emissions	
Pollutant	Tons/year
PM	Less than 100
PM ₁₀	Less than 100
PM _{2.5}	Less than 100
SO ₂	SO2 emissions associated with the process have not been quantified
VOC	Greater than 100, Less than 250
CO	Less than 100
NO _x	Less than 100
Single Worst HAP	Greater than 10
Total HAP	Great than 25

Appendix A of this TSD reflects the unrestricted potential emissions of the source.

- (a) The potential to emit (as defined in 326 IAC 2-7-1(29)) of VOC is equal to or greater than 100 tons per year. However, the Permittee has agreed to limit the source's VOC emissions to less than Title V levels, therefore the Permittee will be issued a FESOP Renewal.
- (b) The potential to emit (as defined in 326 IAC 2-7-1(29)) of any single HAP is equal to or greater than ten (10) tons per year and/or the potential to emit (as defined in 326 IAC 2-7-1(29)) of a combination of HAPs is equal to or greater than twenty-five (25) tons per year. However, the Permittee has agreed to limit the source's single HAP emissions and total HAP emissions below Title V levels. Therefore, the Permittee will be issued a FESOP Renewal.

Potential to Emit After Issuance

The source desires to remain a FESOP source. The table below summarizes the potential to emit, reflecting all limits of the emission units. Any control equipment is considered enforceable only after issuance of this FESOP and only to the extent that the effect of the control equipment is made practically enforceable in the permit.

Process/ Emission Unit	Potential To Emit of the Entire Source After Issuance of Renewal (tons/year)							
	PM	PM ₁₀ *	PM _{2.5} **	SO ₂	NO _x	VOC	Total HAPs	Single HAP
Process Emissions	-	-	-	(1)	-	95.00	>25	>10
Boilers #1&2	0.26	1.04	1.04	0.08	13.66	0.75	0.26	2.46E-01
Diesel Combustion	0.08	0.09	0.06	0.29	0.90	0.01	2.58E-04	-
Natural Gas Combustion	0.03	0.10	0.10	0.01	1.37	0.08	0.03	-
Roads	1.53	0.44	0.04	-	-	-	-	-
Welding and Thermal Cutting	0.39	0.39	0.39	-	-	-	2.27E-03	-
Total PTE of Entire Source	2.28	2.06	1.63	0.38	15.92	95.83	>25	>10
Title V Major Source Thresholds	NA	100	100	100	100	100	25	10
PSD Major Source Thresholds	250	250	250	250	250	250	NA	NA
Emission Offset	-	-	-	100	-	-	NA	NA
negl. = negligible (1) SO ₂ emissions associated with the process have not been quantified. *Under the Part 70 Permit program (40 CFR 70), particulate matter with an aerodynamic diameter less than or equal to a nominal 10 micrometers (PM ₁₀), not particulate matter (PM), is considered as a "regulated air pollutant". **PM _{2.5} listed is direct PM _{2.5} .								

(a) FESOP Status

This existing source is not a Title V major stationary source because the potential to emit criteria pollutants from the entire source will be limited to less than the Title V major source threshold levels. In addition, this existing source is not a major source of HAPs, as defined in 40 CFR 63.41, because the potential to emit HAPs is limited to less than ten (10) tons per year for a single HAP and twenty-five (25) tons per year of total HAPs. Therefore, this source is an area source under Section 112 of the Clean Air Act and is subject to the provisions of 326 IAC 2-8 (FESOP).

In order to render the requirements of 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants), 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) and 326 IAC 2-3 (Emission Offset) not applicable and pursuant to 326 IAC 2-8-4 (FESOP), the permittee shall comply with the following:

- (1) VOC, HAPs and SO₂ emissions from the following tanks shall be controlled by the Sodium Bi-sulfite Scrubber.

Tank	Size	Year Installed
<i>Heated Production Tanks</i>		
P1	14,055	June 2010
P2	21,698	June 2010
P3	21,698	1996
P4	21,698	June 2010

P5	21,698	June 2010
P6	21,698	June 2010
P7	21,698	June 2010
P8	21,698	June 2010
P9	21,698	March 2013
P10	30,079	1996
P11	30,079	1996
P12	30,079	1996
P13	30,079	1996
P14	21,018	July 2003
P15	21,536	July 2003
SHT2	21,995	June 1991
<u>Heated Water Tanks</u>		
W8	25,908	1996
<u>Heated Product Tanks</u>		
D1	12,034	2005
D2	11,664	1996
D3	11,134	1996
D4	17,164	1996
D5	17,164	2001
<u>Heated Product Tanks</u>		
K1	14,381	June 2012
K2	16,073	July 2012
K3	23,512	June 2011

- (2) The temperature of each tank routed to the Sodium Bi-sulfite Scrubber shall not exceed 210°F (99°C).
- (3) VOC emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (4) Emissions of any single HAP from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed nine (9) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (5) Total HAPs emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed twenty-four (24) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (6) Total SO₂ emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall be less than ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

Compliance with these limits, combined with the potential to emit of SO₂, VOC and HAPs from all other units at the source, shall limit the source-wide potential to emit of SO₂ and VOC, each, to less than hundred (100) tons per twelve (12) consecutive month period, a single HAP to less than ten (10) tons per twelve (12) consecutive month period, and the total HAPs to less than twenty-five (25) tons per twelve (12) consecutive month period and shall render the requirements of 326 IAC 2-7 (Part 70 Permit Program) 326 IAC 2-2

(PSD), 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants) and 326 IAC 2-3 (Emission Offset) not applicable.

- (b) This existing stationary source is not major for PSD because the emissions of each regulated pollutant and it is not in one of the twenty-eight (28) listed source categories.
- (c) This existing stationary source is not major for Emission Offset and Nonattainment NSR because the emissions of the nonattainment pollutant, SO₂, is less than one hundred (<100) tons per year.

Federal Rule Applicability

- (a) Pursuant to 40 CFR 64.2, Compliance Assurance Monitoring (CAM) is not included in the permit, because the potential to emit of the source is limited to less than the Title V major source thresholds and the source is not required to obtain a Part 70 or Part 71 permit.

NSPS

- (b) The requirements of the New Source Performance Standards of Performance for Industrial-Commercial-Institutional Steam Generating Units, 40 CFR 60.40b, Subpart Db, are not included in the permit for the boilers because the two (2) boilers have a heat capacity of less than 100 MMBtu/hr.
- (c) The requirements of the New Source Performance Standards of Performance for Small Industrial-Commercial-Institutional Steam Generating Units, 40 CFR 60.40c, Subpart Dc, are included in the permit for the Kewanee boiler. The Leffel boiler was installed before June 9, 1989. The Kewanee boiler was installed after 1989 and has a heat input capacity between 100 MMBtu/hr and 10 MMBtu/hr.

Nonapplicable portions of the NSPS will not be included in the permit. This source is subject to the following portions of Subpart Dc.

- (1) 40 CFR 60.40c(a),(b),(c)
 - (2) 40 CFR 60.41c
 - (3) 40 CFR 60.42c(h)(4), (i)
 - (4) 40 CFR 60.44c(a), (b), (c)
 - (5) 40 CFR 60.46(e)
 - (6) 40 CFR 60.48c(a), (g)(2), (h), (i), (j)
- (d) The requirements of the New Source Performance Standards of Performance for Petroleum Refineries, 40 CFR 60.100, Subpart J and 40 CFR 60.100a, Subpart Ja are not included in the permit because the source does not fit the definition of a petroleum refinery.
- (e) The requirements of the New Source Performance Standards of Performance for Storage Vessels for Petroleum Liquids for Which Construction, Reconstruction, or Modification Commenced After June 11, 1973, and Prior to May 19, 1978, 40 CFR 60.110, Subpart K are not included in the permit because the source contains no storage tanks that were installed between June 11, 1973 to May 19, 1978.
- (f) The requirements of the New Source Performance Standards of Performance for Storage Vessels for Petroleum Liquids for Which Construction, Reconstruction, or Modification Commenced After May 18, 1978, and Prior to July 23, 1984, 40 CFR 60.110a, Subpart Ka are not included in the permit because the source contains no storage tanks that were installed between May 19, 1978 to July 23, 1984.

- (g) The requirements of the New Source Performance Standards of Performance for Volatile Organic Liquid Storage Vessels (Including Petroleum Liquid Storage Vessels) for Which Construction, Reconstruction, or Modification Commenced After July 23, 1984, 40 CFR 60.110b, Subpart Kb are not included in the permit because, although all the tanks at the source were installed after 1984, the tanks have a capacity greater than 75m³ and less than 151m³ storing a liquid with a vapor pressure less than 15.0 kPa.

NESHAP

- (h) The requirements of the National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers and Process Heaters, 40 CFR 63.7480, Subpart DDDDD are not included in the permit because the source has requested limits to remain an area source of HAPs.
- (i) The National Emission Standards for Hazardous Air Pollutants from Off-Site Waste and Recovery Operations, 40 CFR 63.680, Subpart DD are not included in the permit because the source is not a major source of HAPs.
- (j) The requirements of the National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources, 40 CFR 63.11193, Subpart JJJJJ are not included in the permit. The source has industrial boilers and is an area source of HAPs, but the two boilers are gas-fired and not subject to this subpart.

State Rule Applicability - Entire Source

326 IAC 1-6-3 (Preventive Maintenance Plan)

The source is subject to 326 IAC 1-6-3.

326 IAC 1-5-2 (Emergency Reduction Plans)

The source is subject to 326 IAC 1-5-2.

326 IAC 2-6 (Emission Reporting)

This source is not subject to 326 IAC 2-6 (Emission Reporting) because it is not required to have an operating permit pursuant to 326 IAC 2-7 (Part 70); it is not located in Lake, Porter, or LaPorte County, and its potential to emit lead is less than 5 tons per year. Therefore, this rule does not apply.

326 IAC 5-1 (Opacity Limitations)

This source is subject to the opacity limitations specified in 326 IAC 5-1-2(1)

326 IAC 6.5 PM Limitations Except Lake County

This source is not subject to 326 IAC 6.5 because, even though it is located in Marion County, its PM PTE (or limited PM PTE) is less than 100 tons/year and actual emissions are less than 10 tons/year.

State Rule Applicability – Individual Facilities

326 IAC 6-2-4 (Particulate Matter Emission Limitations for Sources of Indirect Heating)

Pursuant to 326 IAC 6-2-1(d), indirect heating facilities which received permit to construct after September 21, 1983 are subject to the requirements of 326 IAC 6-2-4.

The particulate matter emissions (Pt) shall be limited by the following equation:

$$Pt = \frac{1.09}{Q^{0.26}}$$

Pt = Pounds of particulate matter emitted per million British thermal units (lb/MMBtu).

Q = Total source maximum operating capacity rating in MMBtu/hr heat input. The maximum operating capacity rating is defined as the maximum capacity at which the facility is operated or the nameplate capacity, whichever is specified in the facility's permit application, except when some lower capacity is contained in the facility's operation permit; in which case, the capacity specified in the operation .

Indirect Heating Units Which Began Operation After September 21, 1983						
Facility	Construction Date	Operating Capacity (MMBtu/hr)	Q (MMBt/hr)	Calculated Pt (lb/MMBtu)	Particulate Limitation, (Pt) (lb/MMBtu)	PM PTE based on AP-42 (lb/MMBtu)
350 HP Leffel boiler	1987	11.70	11.70	0.58	0.58	1.11E-02
600 HP Kewanee boiler	1993	20.10	34.23	0.44	0.44	1.91E-02
Unit Heater - Maintenance	1993	0.13		0.44	0.44	1.24E-04
Storage Heater - Maintenance	1993	0.18		0.44	0.44	1.66E-04
Unit Heater 3 - Blending	1993	0.18		0.44	0.44	1.66E-04
Unit Heater 4 - Blending	1993	0.18		0.44	0.44	1.66E-04
Unit Heater 5 - Blending	1993	0.18		0.44	0.44	1.66E-04
Make-up Unit 1 - Blending	1993	0.18		0.44	0.44	1.66E-04
Unit Heater 1 - Water Treatment	1993	0.40		0.44	0.44	3.80E-04
Unit Heater 2 - Water Treatment	1993	0.13		0.44	0.44	1.24E-04
Unit Heater 3 - Water Treatment	1993	0.13		0.44	0.44	1.24E-04
Individual Water Heater (temp.)	1993	0.15		0.44	0.44	1.43E-04
Unit Heater 1 - Maintenance	1993	0.13		0.44	0.44	1.24E-04
Unit Heater 2 - Maintenance	1993	0.13		0.44	0.44	1.24E-04
Unit Heater 3 - Storage/Meeting area	1993	0.18		0.44	0.44	1.66E-04
Make-up Unit 3 - Maintenance	1993	0.18		0.44	0.44	1.66E-04
Make-up Unit 2 - Water Treatment	1995	0.95	0.44	0.44	9.00E-04	
Heated Power Washer #1	1997	0.40	34.63	0.43	0.43	4.00E-04
diesel fired salamander	2005	0.40	35.03	0.43	0.43	4.00E-04
Heated Power Washer #2	2012	0.40	35.43	0.43	0.43	4.00E-04
Where: Q = Includes the capacity (MMBtu/hr) of the new unit(s) and the capacities for those unit(s) which were in operation at the source at the time the new unit(s) was constructed.						

The indirect heating units at this facility do not require a control device to comply with the above limits.

326 IAC 6-3 (Particulate Emissions Limitations for Manufacturing Sources)

The welding and thermal cutting operations have potential emissions less than 0.551 pound of PM per hour, therefore 326 IAC 6-3-1 does not apply to this source.

326 IAC 7 (Sulfur Dioxide Rules)

None of the emission units at this facility have the potential to emit 25 tons per year or 10 pounds per hour of sulfur dioxide, therefore 326 IAC 7 does not apply to this source.

326 IAC 8-1-6 (New facilities; general reduction requirements)

Metalworking Lubricants Company is located in Indiana, is not regulated by any other article 8 rules, but each process tank has a potential to emit less than 25 tons of VOC per year. Therefore 326 IAC 8-1-6 does not apply.

326 IAC 8-9 (Volatile Organic Liquid Storage Vessels)

The requirements of 326 IAC 8-9 do not apply to Metalworking Lubricants Company because the source is not located in Clark, Floyd, Lake or Porter County.

Compliance Determination and Monitoring Requirements

Permits issued under 326 IAC 2-8 are required to ensure that sources can demonstrate compliance with all applicable state and federal rules on a continuous basis. All state and federal rules contain compliance provisions, however, these provisions do not always fulfill the requirement for a continuous demonstration. When this occurs, IDEM, OAQ, in conjunction with the source, must develop specific conditions to satisfy 326 IAC 2-8-4. As a result, Compliance Determination Requirements are included in the permit. The Compliance Determination Requirements in Section D of the permit are those conditions that are found directly within state and federal rules and the violation of which serves as grounds for enforcement action.

If the Compliance Determination Requirements are not sufficient to demonstrate continuous compliance, they will be supplemented with Compliance Monitoring Requirements, also in Section D of the permit. Unlike Compliance Determination Requirements, failure to meet Compliance Monitoring conditions would serve as a trigger for corrective actions and not grounds for enforcement action. However, a violation in relation to a compliance monitoring condition will arise through a source's failure to take the appropriate corrective actions within a specific time period.

- (a) The compliance determination and monitoring requirements applicable to this source are as follows:

Emission Unit/Control	Operating Parameters	Frequency
Scrubber	Pressure Drop	Once per day
	Sodium bi-sulfite feed rate	
Tank Temperature	Operating Temperature	Continuously
CEMS	SO ₂ and VOC emissions	Continuously
Backup CEMS	SO ₂ and VOC emissions	Whenever the main CEMS is down for maintenance or repairs for a period of twenty-four (24) hours or more, the backup CEMS must be used continuously.

Sampling	Pollutant	Frequency
Waste oil received and outgoing products (oil)	VOC, HAPs, Sulfur	Shipment

(b) The testing requirements applicable to this source are as follows:

Testing Requirements				
Emission Unit	Control Device	Pollutant	Timeframe for Testing	Frequency of Testing
Scrubber System	Scrubber	VOC outlet, SO2 outlet, and HAPs	Not later than 180 days after the issuance date of this permit	Once every 2.5 years

Proposed Changes

The changes listed below have been made to FESOP Permit No. F097-15365-00139. Deleted language appears as ~~strikethroughs~~ and new language appears in **bold**. These corrections, changes, and removals may include Title I changes (ex Changes that add or modify synthetic minor emission limits).

Summary of IDEM Updates Throughout the Permit

- (a) Reference to the City of Indianapolis, Office of Environmental Services (OES) has been removed from the permit.
- (b) The emission units' equipment descriptions have been updated to better describe the units and process.
- (b) IDEM, OAQ has decided to remove all references to the source mailing address. IDEM, OAQ will continue to maintain records of the mailing address.
- (c) On October 27, 2010, the Indiana Air Pollution Control Board issued revisions to 326 IAC 2. These revisions resulted in changes to the rule sites listed in the permit. These changes are not changes to the underlining provisions. The change is only to site of these rules in Section B - Operational Flexibility. IDEM, OAQ has clarified the rule sites for the Preventive Maintenance Plan.
- (d) IDEM, OAQ has decided that the phrases "no later than" and "not later than" are clearer than "within" in relation to the end of a timeline. Therefore, all references to timelines have been revised to "no later than" or "not later than" except for the timelines in subparagraphs (b)(4) and (b)(5) of Section B - Emergency Provisions and Section B - Annual Fee Payment, in which the underlying rules state "within".
- (e) 326 IAC 2-7 requires that "a responsible official" perform certain actions. 326 IAC 2-7-1(34) allows for multiple people to meet the definition of "responsible official." Therefore, IDEM, OAQ is revising all instances of "the responsible official" to read "a responsible official".
- (f) IDEM, OAQ has decided to clarify what rule requirements a certification needs to meet.

- (g) Several of IDEM's Branches and sections have been renamed. Therefore, IDEM has updated the addresses listed in the permit. References to Permit Administration and Development Section and the Permits Branch have been changed to Permit Administration and Support Section. References to Asbestos Section, Compliance Data Section, Air Compliance Section, and Compliance Branch have been changed to Compliance and Enforcement Branch.
- (i) **Condition B - Permit Term**
The permit term has been updated to once every ten (10) years from once every five (5) years.
- (j) **Section B - Duty to Provide Information**
IDEM, OAQ has revised Section B - Duty to Provide Information by removing the statement that the submittal by the Permittee requires the certification by the "responsible official".
- (k) **Section B - Certification**
IDEM, OAQ has decided to clarify Section B - Certification to be consistent with the rule and to clarify that Section B - Certification only states what a certification must be.
- (l) **Section B - Annual Compliance Certification**
IDEM, OAQ has decided to clarify Section B - Annual Compliance Certification to be consistent with the rule.
- (m) **Section B - Preventive Maintenance Plan**
IDEM, OAQ has decided to clarify Section B - Preventive Maintenance Plan.
- (n) **Section B - Emergency Provisions**
IDEM, OAQ is revising Section B - Emergency Provisions to delete paragraph (h). 326 IAC 2-8-4(3)(C)(ii) allows that deviations reported under an independent requirement do not have to be included in the Quarterly Deviation and Compliance Monitoring Report.
- (o) **Section B - Deviation from Permit Requirements and Section C - General Reporting Requirements**
IDEM, OAQ has decided that having a separate condition for the reporting of deviations is unnecessary. Therefore, Section B - Deviation from Permit Requirements and Conditions has been removed and the requirements of that condition have been added to Section C - General Reporting Requirements. Paragraph (d) of Section C - General Reporting Requirements has been removed because IDEM, OAQ already states the timeline and certification needs of each report in the condition requiring the report.
- (p) **Section B - Permit Renewal**
IDEM, OAQ has decided to state which rule establishes the authority to set a deadline for the Permittee to submit additional information. Therefore, Section B - Permit Renewal has been revised.
- (q) **Section B - Source Modification Requirement**
IDEM, OAQ has decided to reference 326 IAC 2 in Section B - Source Modification Requirement rather than the specific construction rule.
- (r) **Section C - Overall Source Limit**
IDEM, OAQ has decided to clarify Section C - Overall Source Limit to be consistent with the rule.
- (s) **Section C - Opacity**
IDEM, OAQ has added 326 IAC 5-1-1 to the exception clause of Section C - Opacity, since 326 IAC 5-1-1 does list exceptions.
- (t) **Section C - Incineration**
IDEM, OAQ has revised Section C - Incineration to more closely reflect the two underlying rules.

- (u) **Section C - Fugitive Particulate Matter Emission Limitations**
IDEM, OAQ has decided not to list the submission date of the Fugitive Dust Plan because the plan has been included with the permit and requires permit action to change the plan.
- (v) **Section C - Fugitive Particulate Matter Emissions**
IDEM, OAQ has changed the title, order, and wording of the condition formerly entitled Section C - Fugitive Dust Emissions to match 326 IAC 6.8-10-3.
- (w) **Section C - Asbestos Abatement Projects**
IDEM, OAQ has revised paragraph (g) of Section C - Asbestos Abatement Projects to match the rule language in 326 IAC 14-10-1(a).
- (x) **Section C - Performance Testing**
IDEM, OAQ has removed the first paragraph of Section C - Performance Testing due to the fact that specific testing conditions elsewhere in the permit will specify the timeline and procedures.
- (y) **Section C - Compliance Monitoring**
IDEM, OAQ has revised Section C - Compliance Monitoring. The reference to recordkeeping has been removed due to the fact that other conditions already address recordkeeping. The voice of the condition has been changed to clearly indicate that it is the Permittee that must follow the requirements of the condition.

IDEM is changing the Section C - Compliance Monitoring Condition to clearly describe when new monitoring for new and existing units must begin.
- (z) **Section C - Monitoring Methods**
IDEM, OAQ has removed Section C - Monitoring Methods. The conditions that require the monitoring or testing, if required, state what methods shall be used.
- (aa) **Section C - Instrument Specifications**
IDEM has clarified Section C - Instrument Specifications to indicate that the analog instrument must be capable of measuring the parameters outside the normal range.
- (bb) **Section C - Response to Excursions or Exceedances**
IDEM, OAQ has revised Section C - Response to Excursions or Exceedances. The introduction sentence has been added to clarify that it is only when an excursion or exceedance is detected that the requirements of this condition need to be followed. The word "excess" was added to the last sentence of paragraph (a) because the Permittee only has to minimize excess emissions. The middle of paragraph (b) has been deleted as it was duplicative of paragraph (a). The phrase "or are returning" was added to subparagraph (b)(2) as this is an acceptable response assuming the operation or emission unit does return to normal or its usual manner of operation. The phrase "within the indicator range, designated condition, or below the applicable emission limitation or standard, as applicable" was replaced with "normal or usual manner of operation" because the first phrase is just a limited list of the second phrase. The recordkeeping required by paragraph (e) was changed to require only records of the response because the previously listed items are required to be recorded elsewhere in the permit.
- (cc) **Section C - Actions Related to Noncompliance Demonstrated by a Stack Test**
IDEM, OAQ has revised Section C - Actions Related to Noncompliance Demonstrated by a Stack Test. The requirements to take response steps and minimize excess emissions have been removed because Section C - response to Excursions or Exceedances already requires response steps related to exceedances and excess emissions minimization. The start of the timelines was revised from "the receipt of the test results" to "the date of the test". There was confusion if the "receipt" was by IDEM, the Permittee or someone else. Since the start of the timelines has been moved up, the length of the timelines was increased. The new timelines require action within a

comparable timeline; and the new timelines still ensure that the Permittee will return to compliance within a reasonable timeframe.

(dd) **Section C - General Record Keeping Requirements**

The voice of paragraph (b) of Section C - General Record Keeping Requirements has been changed to clearly indicate that it is the Permittee that must follow the requirements of the paragraph. IDEM, OAQ has clarified the Permittee's responsibility with regards to record keeping. IDEM has added "where applicable" to the lists in Section C - General Record Keeping Requirements to more closely match the underlining rule.

(ee) **Section C - General Reporting Requirements**

IDEM, OAQ has decided to clarify Section C - General Reporting Requirements to be consistent with the rule.

(ff) **Section C - Compliance with 40 CFR 82 and 326 IAC 22-1**

IDEM, OAQ has decided to simplify the referencing in Section C - Compliance with 40 CFR 82 and 326 IAC 22-1.

Section A - Modifications

- (a) Effective May 11, 2010 all Indiana Counties were designated as attainment for the 8-hour ozone standard.
- (b) Section A has been revised to incorporate the appropriate IDEM updates detailed above under "Summary of IDEM Updates Throughout the Permit."

Section A has been Modified as follows:

This permit is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ) ~~the City of Indianapolis, Office of Environmental Services (OES)~~. The information describing the source contained in conditions A.1 through A.3 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Permittee to obtain additional permits or seek modification of this permit pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

A.1 General Information [326 IAC 2-8-3(b)]

The Permittee owns and operates a stationary waste oil recycling plant, ~~using two boilers.~~

~~Authorized individual:~~ Plant Manager

Source Address: 1509 South Senate Avenue, Indianapolis, Indiana 46225

~~Mailing Address:~~ 1509 South Senate Avenue, Indianapolis, Indiana 46225

General Source Phone Number: (317) 269-2444

Source Location Status: ~~Nonattainment for 8-hour ozone~~

Source Status: Federally Enforceable State Operating Permit **Program**
~~(FESOP)~~

Not 1 of 28 Source Categories

A.2 Emission Units and Pollution Control Equipment Summary [326 IAC 2-8-3(c)(3)]

This stationary source consists of the following emission units and pollution control devices:

- (a) 350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas and Distillate #4, Residual #4 and recycled Fuel Oil-fired, identified as Emission Unit ID #1.;
and
- (b) 600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas and Distillate #4, Residual #4 and recycled Fuel Oil-fired, identified as Emission Unit ID #2.
- (c) **Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.**

Tank	Size	Year Installed	Heat Source
P1	14,055	June 2010	Steam Injection
P2	21,698	June 2010	Steam Injection
P3	21,698	1996	Steam Injection
P4	21,698	June 2010	Steam Injection
P5	21,698	June 2010	Steam Injection
P6	21,698	June 2010	Steam Injection
P7	21,698	June 2010	Steam Injection
P8	21,698	June 2010	Steam Injection
P9	21,698	March 2013	Steam Injection
P10	30,079	1996	Steam Injection
P11	30,079	1996	Steam Injection
P12	30,079	1996	Steam Injection
P13	30,079	1996	Steam Injection
P14	21,018	July 2003	Steam Injection
P15	21,536	July 2003	Steam Injection
SHT2	21,995	June 1991	Steam Injection

- (d) **Heated Water tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.**

Tank	Size	Year Installed	Heat Source
W8	25,908	1996	Steam Injection

- (e) **Heated Product tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.**

Tank	Size	Year Installed	Heat Source
D1	12,034	2005	Heat Exchanger
D2	11,664	1996	Heat Exchanger
D3	11,134	1996	Heat Exchanger
D4	17,164	1996	Heat Exchanger
D5	17,164	2001	Heat Exchanger

- (f) **Heated Product tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.:**

Tank	Size	Year Installed	Heat Source
K1	14,381	June 2012	Heat Exchanger
K2	16,073	July 2012	Heat Exchanger
K3	23,512	June 2011	Heat Exchanger

(g) Heated Incoming Water Oil tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
W2	Outdoor	19,431	1996	Steam Injection
W3	Outdoor	17,842	1996	Steam Injection
W4	Outdoor	21,995	1996	Steam Injection
W5	Outdoor	21,995	1996	Steam Injection
W6	Outdoor	21,995	1996	Steam Injection
W7	Outdoor	21,995	1996	Steam Injection

(h) Heated Waste Water tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
FET2	Outdoor	22,022	1996	Steam Injection
FET3	Outdoor	20,402	1996	Steam Injection
FET4	Outdoor	17,488	1996	Steam Injection

(i) Heated Oil/Water separation tank venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
Big Pit	Indoor	60,000	pre-1993	Steam Injection

(j) Heated Oil tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
M1	Indoor	1,151	1992	Heat Exchanger
M2	Indoor	7,637	January 2013	Heat Exchanger
M3	Indoor	6,175	1992	Heat Exchanger
M4	Indoor	7,637	1992	Heat Exchanger
M5	Indoor	7,637	1992	Heat Exchanger

(k) Heated Blending and Storage tanks, blending of final product streams, venting to the atmosphere.

Tank	Vent to:	Size	Year Installed	Heat Source
B10	Outdoor	15,545	pre-1993	Heat Exchanger
B14	Outdoor	11,848	pre-1993	Heat Exchanger

B19	Outdoor	18,459	pre-1993	Heat Exchanger
B20	Outdoor	11,335	pre-1993	Heat Exchanger
B26	Outdoor	18,349	pre-1993	Heat Exchanger
B27	Outdoor	19,055	pre-1993	Heat Exchanger
B28	Outdoor	20,292	pre-1993	Heat Exchanger
B31	Outdoor	10,636	pre-1993	Heat Exchanger
B32	Outdoor	27,970	pre-1993	Heat Exchanger
B33	Outdoor	27,970	pre-1993	Heat Exchanger
B34	Outdoor	26,504	pre-1993	Heat Exchanger
B36	Outdoor	29,609	pre-1993	Heat Exchanger
B37	Outdoor	26,504	pre-1993	Heat Exchanger
B42	Outdoor	7,753	pre-1993	Heat Exchanger
B44	Outdoor	19,159	pre-1993	Heat Exchanger
B45	Outdoor	4,505	pre-1993	Heat Exchanger
B50	Outdoor	10,363	pre-1993	Heat Exchanger

(I) Unheated tanks for blending and storage of final product, venting to the atmosphere:

Tank	Vent to:	Size	Year Installed
B1	Outdoor	13,107	pre-1993
B11	Outdoor	4,505	pre-1993
B12	Outdoor	4,505	pre-1993
B13	Outdoor	4,505	pre-1993
B15	Outdoor	19,431	pre-1993
B16	Outdoor	16,075	pre-1993
B17	Outdoor	18,459	pre-1993
B18	Outdoor	18,459	pre-1993
B2	Outdoor	19,159	pre-1993
B21	Outdoor	5,710	pre-1993
B22	Outdoor	5,076	pre-1993
B23	Outdoor	5,076	pre-1993
B24	Outdoor	10,583	pre-1993
B25	Outdoor	18,897	pre-1993
B29	Outdoor	8,054	pre-1993
B3	Outdoor	19,159	pre-1993
B30	Outdoor	9,198	pre-1993
B35	Outdoor	29,609	pre-1993
B38	Outdoor	29,609	pre-1993
B39	Outdoor	29,609	pre-1993
B4	Outdoor	30,079	pre-1993
B40	Outdoor	7,010	pre-1993
B41	Outdoor	8,662	pre-1993
B43	Outdoor	7,423	pre-1993
B46	Outdoor	21,995	pre-1993
B47	Outdoor	25,702	1996
B48	Outdoor	18,135	1996
B49	Outdoor	20,079	pre-1993
B50	Outdoor	19,107	pre-1993
B51	Outdoor	20,351	pre-1993
B52	Outdoor	30,455	pre-1993
B53	Outdoor	2,133	1993
B54	Outdoor	2,133	1993
B55	Outdoor	2,133	1993
B6	Outdoor	18,459	pre-1993
B7	Outdoor	19,755	pre-1993
B8	Outdoor	20,726	pre-1993
B9	Outdoor	19,159	pre-1993

Tank	Vent to:	Size	Year Installed
B99	Outdoor	10,000	pre-1993

(m) Unheated Waste Water tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
A4	Outdoor	14,102	April 1997
C2	Outdoor	12,925	October 1992
C3	Outdoor	12,925	October 1992
FET1	Indoor	15,545	2003
Small Pit	Indoor	10,854	October 1993
Small Pit	Indoor	10,854	October 1993

(n) Unheated Additive Storage tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
Acid	Indoor	5,922	1996
Alum1	Indoor	5,264	2001
Alum2	Indoor	4,136	2001
Caustic	Indoor	6,862	1996
Coagulent	Indoor	7,520	2001
Polymer	Indoor	7,637	2001

(o) Unheated Product Storage tank venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
SHT1	Indoor	11,497	2000

(p) Unheated Waste Oil Storage tanks venting to the atmosphere.

Tank	Vent to:	Size	Year Installed
ST10	Outdoor	30,079	1996
ST11	Outdoor	20,079	1996
ST13	Outdoor	11,658	1996
ST14	Outdoor	15,545	1996
ST3	Outdoor	21,374	1996
ST42	Outdoor	42,297	1996
ST5	Outdoor	25,908	1996
ST6	Outdoor	25,908	1996
ST9	Outdoor	19,431	1996

(q) One (1) Sodium Bi-sulfite Scrubber, constructed in 1980, exhausting to stack S-01.

A.3 **Specifically Regulated** Insignificant Activities [326 IAC 2-7-1(21)] [326 IAC 2-8-3(c)(3)(I)]

This stationary source also includes the following insignificant activities, as defined in 326 IAC 2-

~~7-1(21):~~

- (a) Natural gas-fired combustion sources with heat input equal to or less than ten (10) million Btu per hour:
- (1) Unit Heater - Maintenance, **0.130 MMBtu/hr.MBH;**
 - (2) Storage Heater - Maintenance, **0.175 MMBtu/hr.MBH;**
 - (3) Unit Heater 1 - Blending, **0.175 MMBtu/hr.MBH;**
 - (4) Unit Heater 2 - Blending, **0.175 MMBtu/hr.;MBH;**
 - (5) Unit Heater 3 - Blending, **0.175 MMBtu/hr.MBH;**
 - (6) Make-up Unit - Blending, **0.175 MMBtu/hr.MBH;**
 - (7) Unit Heater 1 - Water Treatment, **0.400 MMBtu/hr.MBH;**
 - (8) Unit Heater 2 - Water Treatment, **0.130 MMBtu/hr.MBH;**
 - (9) Unit Heater 3 - Water Treatment, **0.130 MMBtu/hr.;MBH;**
 - (10) Make-up Unit - Water Treatment, **0.985 MMcf/hr.CFH;**
 - (11) Individual Water Heater (temp.), **0.150 MMBtu/hr.MBH;**
 - (12) Space Heater 1 - Office, **0.115 MMBtu/hr.MBH;**
 - (13) Space Heater 2 - Office, **0.115 MMBtu/hr.;MBH;**
 - (14) Space Heater 3 - Office, **0.130 MMBtu/hr..MBH.**
- (b) **One (1) portable air compressor with a maximum capacity of 5.5 HP, constructed in 2011.**
- (c) **One (1) diesel fired salamander, with a maximum capacity of 0.4 MMBtu/hr, constructed in 2005.**
- (d) **One (1) portable power washer with a diesel water heater, identified as Power Washer #1, with a maximum capacity of 0.4 MMBtu/hr, constructed in 1997.**
- (e) **One (1) portable power washer with a diesel water heater, identified as Power Washer #2, with a maximum capacity of 0.4 MMBtu/hr constructed in 2012.**
- ~~(j) Vent and scrubber system serving the outside oil processing tanks and dryer tanks shown in table A-1 solely for odor control.~~

~~Table A-1~~

Waste Codes/Location	Type/Construction	number of tanks /Size	Quantity
Used Oil/ D tank farm	above ground /steel	5 /10,000	approx. 40,000 gallons total
Used Oil/ H	above ground /steel	3/10,000	approx. 15,000 gallons total
product Oil/ P tank farm	above ground/steel	9/20,000	approx. 100,000 gallons total

product Oil/ P tank farm 10-13	above ground/steel	4/30,000	approx. 70,000 gallons total
-----------------------------------	--------------------	----------	---------------------------------

A.3 Insignificant Activities [326 IAC 2-7-1(21)] [326 IAC 2-8-3(c)(3)(I)]

This stationary source also includes the following insignificant activities, as defined in 326 IAC 2-7-1(21):

- (a) **Petroleum fuel dispensing facility, having a storage capacity of less than 10,500 gallons;**
- (b) **Vessels storing lubricating oils, hydraulic oils, machining oils, and machining fluids;**
- (c) **Activities associated with the treatment of wastewater streams with an oil and grease content less than or equal to one percent (1%) by volume;**
- (d) **Paved and unpaved roads and parking lots with public access;**
- (e) **Equipment used to collect any material that might be released during a malfunction, process upset, or spill cleanup, including catch tanks, temporary liquid separators, tanks, and fluid handling equipment;**
- (f) **Blowdown for any of the following: sight glasses, boilers, compressors, pumps;**
- (g) **A laboratory as defined in 326 IAC 2-7-1(21)(D), utilizing Freon (CFC 113) used in lab and recovered for reuse;**
- (h) **One (1) oxygen-acetylene cutting torch, identified as torch cutting operation, with a maximum capacity of 24 in/minute.**
- (i) **Two (2) hazardous waste tanks**
- (j) **Three (3) welding stations with a maximum capacity of 310 lbs/yr.**
 - (1) **One (1) Miller Thunderbolt Stick welding station, identified as Welding Station #1, constructed in 1998.**
 - (2) **One (1) Miller Trailblazer Stick welding station powered by a 16 HP engine, identified as Welding Station #2, constructed in 1998.**
 - (3) **One (1) Lincoln Electric Weldanpower 225 G7 Stick welding station powered by a 16 HP engine, identified as Welding Station #3, constructed in 1993.**

A.45 FESOP Applicability [326 IAC 2-8-2]

This stationary source, otherwise required to have a Part 70 permit as described in 326 IAC 2-7-2(a), has applied to the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ) and the OES to renew a Federally Enforceable State Operating Permit (FESOP).

A.5 Prior Permits Superseded [326 IAC 2-1.1-9.5]

- (a) ~~All terms and conditions of previous permits issued pursuant to permitting programs approved into the state implementation plan have been either~~

(1) ~~incorporated as originally stated,~~

(2) ~~revised, or~~

(3) ~~deleted~~

~~by this permit.~~

(b) ~~All previous registrations and permits are superseded by this permit.~~

Section B and Section C - Modifications

Section B and Section C has been revised to incorporate the appropriate IDEM updates detailed above under "Summary of IDEM Updates Throughout the Permit."

Section B and Section C has been Modified as follows:

SECTION B GENERAL CONDITIONS

B.2 Permit Term [326 IAC 2-8-4(2)][326 IAC 2-1.1-9.5][IC 13-15-3-6(a)]

- (a) This permit, ~~F097-3251315365-00139~~, is issued for a fixed term of ~~five (5)~~ **ten (10)** years from the issuance date of this permit, as determined in accordance with IC 4-21.5-3-5(f) and IC 13-15-5-3. Subsequent revisions, modifications, or amendments of this permit do not affect the expiration date of this permit.
- (b) If IDEM, OAQ ~~and OES~~, upon receiving a timely and complete renewal permit application, fails to issue or deny the permit renewal prior to the expiration date of this permit, this existing permit shall not expire and all terms and conditions shall continue in effect, until the renewal permit has been issued or denied.

B.4 Enforceability [326 IAC 2-8-6][**IC 13-17-12**]

- (a) Unless otherwise stated, all terms and conditions in this permit, including any provisions designed to limit the source's potential to emit, are enforceable by IDEM ~~and OES~~, the United States Environmental Protection Agency (U.S. EPA) and by citizens in accordance with the Clean Air Act.
- (b) ~~Unless otherwise stated, all terms and conditions in this permit that are local requirements, including any provisions designed to limit the sources potential to emit, are enforceable by OES.~~

B.7 Duty to Provide Information [326 IAC 2-8-4(5)(E)]

- (a) The Permittee shall furnish to IDEM, OAQ ~~and OES~~, within a reasonable time, any information that IDEM, OAQ ~~and OES~~ may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit, or to determine compliance with this permit. ~~The submittal by the Permittee does require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-4(1).~~ Upon request, the Permittee shall also furnish to IDEM, OAQ ~~and OES~~ copies of records required to be kept by this permit.
- (b) ***

~~B.8 Compliance Order Issuance [326 IAC 2-8-5(b)]~~

~~IDEM, OAQ and OES may issue a compliance order to this Permittee upon discovery that this permit is in nonconformance with an applicable requirement. The order may require immediate compliance or contain a schedule for expeditious compliance with the applicable requirement.~~

~~B.98 Certification [326 IAC 2-8-3(d)][326 IAC 2-8-4(3)(C)(i)][326 IAC 2-8-5(1)]~~

~~(a) Where specifically designated by this permit or required by an applicable requirement, any application form, report, or compliance A certification submitted shall contain required by this permit meets the requirements of 326 IAC 2-8-5(a)(1) if:~~

~~(1) it contains a certification by an "authorized individual" of truth, accuracy, and completeness. This as defined by 326 IAC 2-1.1-1(1). and~~

~~(2) the certification shall state states that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete.~~

~~(b) One (1) certification shall be included, using The Permittee may use the attached Certification Form, or its equivalent with each submittal requiring certification. One (1) certification may cover multiple forms in one (1) submittal.~~

~~(c) ***~~

~~B.409 Annual Compliance Certification [326 IAC 2-8-5(a)(1)]~~

~~(a) The Permittee shall annually submit a compliance certification report which addresses the status of the source's compliance with the terms and conditions contained in this permit, including emission limitations, standards, or work practices. All certifications shall cover the time period from January 1 to December 31 of the previous year, and shall be submitted no later than July 1 April 15th of each year to:~~

~~Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251~~

~~and~~

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224~~

~~(b) The annual compliance certification report required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ and OES, on or before the date it is due.~~

~~(c) ***~~

~~(1) ***~~

~~(2) ***~~

(3) ***

(4) ***

(5) Such other facts, as specified in Sections D of this permit, as IDEM, OAQ and ~~OES~~ may require to determine the compliance status of the source.

The submittal by the Permittee does require ~~the~~ a certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

B.10 Compliance Order Issuance [326 IAC 2-8-5(b)]

IDEM, OAQ may issue a compliance order to this Permittee upon discovery that this permit is in nonconformance with an applicable requirement. The order may require immediate compliance or contain a schedule for expeditious compliance with the applicable requirement.

B.11 Preventive Maintenance Plan [326 IAC 1-6-3][326 IAC 2-8-4(9)][326 IAC 2-8-5(a)(1)]

(a) A Preventive Maintenance Plan meets the requirements of 326 IAC 1-6-3 if it includes, at a minimum:

- (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;**
- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and**
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.**

The Permittee shall implement the PMPs.

(ab) If required by specific condition(s) in Section D of this permit where no PMP was previously required, the Permittee shall prepare and maintain and implement Preventive Maintenance Plans (PMPs) no later than ninety (90) days after issuance of this permit or ninety (90) days after initial start-up, whichever is later, including the following information on each facility:

If, due to circumstances beyond the Permittee's control, the PMPs cannot be prepared and maintained within the above time frame, the Permittee may extend the date an additional ninety (90) days provided the Permittee notifies:

**Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251**

The PMP extension notification does not require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

The Permittee shall implement the PMPs.

(cb) A copy of the PMPs shall be submitted to IDEM, OAQ and ~~OES~~ upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ and ~~OES~~.

IDEM, OAQ and ~~OES~~ may require the Permittee to revise its PMPs whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions ~~or potential to emit~~. The PMPs **and their submittal** do not require ~~the~~ certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

(de) ***

B.12 Emergency Provisions [326 IAC 2-8-12]

(a) ***

(b) ***

(1) ***

(2) ***

(3) ***

(4) For each emergency lasting one (1) hour or more, the Permittee notified IDEM, OAQ, ~~and OES~~ within four (4) daytime business hours after the beginning of the emergency, or after the emergency was discovered or reasonably should have been discovered;

Telephone Number: 1-800-451-6027 (ask for Office of Air Quality, Compliance **and Enforcement Branch** ~~Section~~), or
Telephone Number: 317-233-0178 (ask for **Office of Air Quality** Compliance **and Enforcement Branch** ~~Section~~)
Facsimile Number: 317-233-6865
~~Office of Environmental Services phone: (317) 327-2234; fax: (317) 327-2274~~

(5) ***

Indiana Department of Environmental Management
Compliance **and Enforcement** Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

~~and~~

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224~~

The notification which shall be submitted by the Permittee does not require ~~the~~ certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

(6) ***

(c) ***

(d) ***

- (e) The Permittee seeking to establish the occurrence of an emergency shall make records available upon request to ensure that failure to implement a PMP did not cause or contribute to an exceedance of any limitations on emissions. However, IDEM, OAQ and OES may require that the Preventive Maintenance Plans required under 326 IAC 2-8-3(c)(6) be revised in response to an emergency.
- (f) Failure to notify IDEM, OAQ and OES by telephone or facsimile of an emergency lasting more than one (1) hour in accordance with (b)(4) and (5) of this condition shall constitute a violation of 326 IAC 2-8 and any other applicable rules.
- (g) ***
- ~~(h) The Permittee shall include all emergencies in the Quarterly Deviation and Compliance Monitoring Report.~~

B.13 Prior Permits Superseded [326 IAC 2-1.1-9.5]

- (a) All terms and conditions of permits established prior to F097-~~32519~~22764-00139 and issued pursuant to permitting programs approved into the state implementation plan have been either:

- (b) ***

~~**B.15 Deviations from Permit Requirements and Conditions [326 IAC 2-8-4(3)(C)(ii)]**~~

- ~~(a) Deviations from any permit requirements (for emergencies see Section B - Emergency Provisions), the probable cause of such deviations, and any response steps or preventive measures taken shall be reported to:~~

~~Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue
Indianapolis, Indiana 46204-2254~~

~~and~~

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224~~

~~using the attached Quarterly Deviation and Compliance Monitoring Report, or its equivalent. A deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report.~~

~~The Quarterly Deviation and Compliance Monitoring Report does require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-4(1).~~

- ~~(b) A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit.~~

**B.165 Permit Modification, Reopening, Revocation and Reissuance, or Termination
[326 IAC 2-8-4(5)(C)][326 IAC 2-8-7(a)][326 IAC 2-8-8]**

- (a) This permit may be modified, reopened, revoked and reissued, or terminated for cause. The filing of a request by the Permittee for a Federally Enforceable State Operating

Permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance does not stay any condition of this permit. [326 IAC 2-8-4(5)(C)] The notification by the Permittee does require ~~a the~~ certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (b) ***
- (c) Proceedings by IDEM, OAQ, ~~or OES~~ to reopen and revise this permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. Such reopening and revision shall be made as expeditiously as practicable. [326 IAC 2-8-8(b)]
- (d) The reopening and revision of this permit, under 326 IAC 2-8-8(a), shall not be initiated before notice of such intent is provided to the Permittee by IDEM, OAQ, ~~or OES~~ at least thirty (30) days in advance of the date this permit is to be reopened, except that IDEM, OAQ, ~~or OES~~ may provide a shorter time period in the case of an emergency. [326 IAC 2-8-8(c)]

B.176 Permit Renewal [326 IAC 2-8-3(h)]

- (a) The application for renewal shall be submitted using the application form or forms prescribed by IDEM, OAQ, ~~and OES~~ and shall include the information specified in 326 IAC 2-8-3. Such information shall be included in the application for each emission unit at this source, except those emission units included on the trivial or insignificant activities list contained in 326 IAC 2-7-1(21) and 326 IAC 2-7-1(~~4240~~). The renewal application does require ~~a the~~ certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

Indiana Department of Environmental Management
Permits **Administration and Support Section**~~Branch~~, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46221~~

- (b) ***
 - (1) ***
 - (2) If the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, ~~and OES~~ on or before the date it is due.
- (c) If the Permittee submits a timely and complete application for renewal of this permit, the source's failure to have a permit is not a violation of 326 IAC 2-8 until IDEM, OAQ ~~and OES~~ takes final action on the renewal application, except that this protection shall cease to apply if, subsequent to the completeness determination, the Permittee fails to submit by the deadline specified, **pursuant to 326 IAC 2-8-3(g)**, in writing by IDEM, OAQ ~~and OES~~ any additional information identified as being needed to process the application.

B.187 Permit Amendment or Revision [326 IAC 2-8-10][326 IAC 2-8-11.1]

(a) ***

(b) ***

Indiana Department of Environmental Management
Permits **Administration and Support Section Branch**, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46221~~

Any such application **does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1)** shall be certified by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

(c) ***

B.198 Operational Flexibility [326 IAC 2-8-15][326 IAC 2-8-11.1]

(a) The Permittee may make any change or changes at the source that are described in 326 IAC 2-8-15(b) ~~through (d)~~ **and (c)** without a prior permit revision, if each of the following conditions is met:

(1) ***

(2) ***

(3) ***

(4) The Permittee notifies the:

Indiana Department of Environmental Management
Permits **Administration and Support Section Branch**, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

**United States Environmental Protection Agency, Region V
Air and Radiation Division, Regulation Development Branch - Indiana (AR-18J)
77 West Jackson Boulevard
Chicago, Illinois 60604-3590**

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46221
***~~

- (5) The Permittee maintains records on-site, on a rolling five (5) year basis, which document all such changes and emission trades that are subject to 326 IAC 2-8-15(b)(1) through ~~(d) and (c)~~. The Permittee shall make such records available, upon reasonable request, for public review.

Such records shall consist of all information required to be submitted to IDEM, OAQ ~~and OES~~ in the notices specified in 326 IAC 2-8-15(b)(21) and (c)(1), ~~and (d)~~.

- (b) Emission Trades [326 IAC 2-8-15~~(be)~~]
The Permittee may trade emissions increases and decreases at in the source, where the applicable SIP provides for such emission trades without requiring a permit revision, subject to the constraints of Section (a) of this condition and those in 326 IAC 2-8-15~~(eb)~~.
- (c) Alternative Operating Scenarios [326 IAC 2-8-15~~(ec)~~]

- (d) Backup fuel switches specifically addressed in, and limited under, Section D of this permit shall not be considered alternative operating scenarios. Therefore, the notification requirements of part (a) of this condition do not apply.

B.2019 Source Modification Requirement [326 IAC 2-8-11.1]

A modification, construction, or reconstruction is governed by the requirements of 326 IAC 2 ~~and 326 IAC 2-8-11.1~~.

B.240 Inspection and Entry [326 IAC 2-8-5(a)(2)][IC 13-14-2-2][IC 13-17-3-2][IC13-30-3-1]

Upon presentation of proper identification cards, credentials, and other documents as may be required by law, and subject to the Permittee's right under all applicable laws and regulations to assert that the information collected by the agency is confidential and entitled to be treated as such, the Permittee shall allow IDEM, OAQ, U.S. EPA, ~~and OES~~ or an authorized representative to perform the following:

B.221 Transfer of Ownership or Operational Control [326 IAC 2-8-10]

- (a) ***
(b) ***

Indiana Department of Environmental Management
Permits **Administration and Support Section Branch**, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224~~

~~The Any such~~ application which shall be submitted by the Permittee does require ~~a the~~ certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

(c) ***

B.232 Annual Fee Payment [326 IAC 2-7-19] [326 IAC 2-8-4(6)] [326 IAC 2-8-16][326 IAC 2-1.1-7]

(a) The Permittee shall pay annual fees to IDEM, OAQ, ~~and OES~~ **within no later than thirty (30) calendar days of receipt of a billing.** Pursuant to 326 IAC 2-7-19(b), if the Permittee does not receive a bill from IDEM, OAQ, ~~or OES~~ the applicable fee is due April 1 of each year.

(b) ***

(c) ***

B.243 Credible Evidence [326 IAC 2-8-4(3)][326 IAC 2-8-5][62 FR 8314] [326 IAC 1-1-6]

SECTION C SOURCE OPERATION CONDITIONS

C.2 Overall Source Limit [326 IAC 2-8]

(a) ***

(1) The potential to emit any regulated pollutant, except particulate matter (PM) **and greenhouse gases (GHGs)**, from the entire source shall be limited to less than one-hundred (100) tons per twelve (12) consecutive month period. ~~This limitation shall also make the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) and 326 IAC 2-3 (Emission Offset) not applicable~~

(2) ***

(3) ***

(4**b**) The potential to emit **greenhouse gases (GHGs) from the entire source shall be limited to less than one hundred thousand (100,000) tons of CO₂ equivalent emissions (CO₂e) per twelve (12) consecutive month period.**

(b) **Pursuant to 326 IAC 326 IAC 2-2 (PSD), potential to emit** particulate matter (PM) from the entire source shall be limited to less than ~~one two-hundred and fifty (250) tons per twelve (12) consecutive month period. This limitation shall make the requirements of 326 IAC 2-2 (Prevention of Significant Deterioration) is not applicable.~~ **100** tons per twelve (12) consecutive month period.

(c) ***

(d) ***

C.3 Opacity [326 IAC 5-1]

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1 **(Applicability) and 326 IAC 5-1-3** (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:

C.5 Incineration [326 IAC 4-2] [326 IAC 9-1-2]

The Permittee shall not operate an incinerator ~~or incinerate any waste or refuse~~ except as provided in 326 IAC 4-2 **or in this permit. The Permittee shall not operate a refuse incinerator or refuse burning equipment except as provided in and** 326 IAC 9-1-2 **or in this permit.**

C.6 Fugitive Dust Emissions [326 IAC 6-4]

The Permittee shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6-4 (~~Fugitive Dust Emissions~~).

C.7 ~~Fugitive Particulate Matter Emission Limitations [326 IAC 6-5]~~

~~Pursuant to 326 IAC 6-5 (Fugitive Particulate Matter Emission Limitations), fugitive particulate matter emissions shall be controlled according to the plan submitted on April 2, 1996. The plan consists of:~~

- ~~(a) The application of wet dust suppression on as needed basis with 0.2 gallons per square yard of calcium chloride.~~

C.87 Stack Height [326 IAC 1-7]

The Permittee shall comply with the applicable provisions of 326 IAC 1-7 (Stack Height Provisions), for all exhaust stacks through which a potential (before controls) of twenty-five (25) tons per year or more of particulate matter or sulfur dioxide is emitted.

C.98 Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61, Subpart M]

- (a) ****
(b) ***
(c) ***
(d) ***

Indiana Department of Environmental Management
~~Asbestos Section~~**Compliance and Enforcement Branch**, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224~~

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (e) ***
(f) ***
(g)

~~Indiana Accredited~~ **Licensed** Asbestos Inspector
The Permittee shall comply with 326 IAC 14-10-1(a) that requires the owner or operator, prior to a renovation/demolition, to use an Indiana ~~Accredited~~ **Licensed** Asbestos

Inspector to thoroughly inspect the affected portion of the facility for the presence of asbestos.

C.409 Performance Testing [326 IAC 3-6]

- (a) All **For performance** testing shall be performed according to the provisions of 326 IAC 3-6 (Source Sampling Procedures), except as provided elsewhere in **required by** this permit, utilizing any applicable procedures and analysis methods specified in 40 CFR 51, 40 CFR 60, 40 CFR 61, 40 CFR 63, 40 CFR 75, or other procedures approved by IDEM, OAQ.

Indiana Department of Environmental Management
Compliance and Enforcement Branch Data Section, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224

no later than thirty-five (35) days prior to the intended test date. The protocol submitted by the Permittee does not require a certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual test date. The notification submitted by the Permittee does not require a certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (c) Pursuant to 326 IAC 3-6-4(b), all test reports must be received by IDEM, OAQ and OES not later than forty-five (45) days after the completion of the testing. An extension may be granted by IDEM, OAQ, and OES if the Permittee submits to IDEM, OAQ, a reasonable written explanation not later than five (5) days prior to the end of the initial forty-five (45) day period.

C.410 Compliance Requirements [326 IAC 2-1.1-11]

C.121 Compliance Monitoring [326 IAC 2-8-4(3)][326 IAC 2-8-5(a)(1)]

- (a) **For new units:**
Unless otherwise specified in the approval for the new emission unit(s), compliance monitoring for new emission units shall be implemented on and after the date of initial start-up.
- (b) **For existing units:**
Unless otherwise specified in this permit, for all monitoring and record keeping requirements not already legally required shall be implemented within ninety (90) days of permit issuance. If required by Section D, the Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related **allowed up to that equipment. If ninety (90) days from the date of permit issuance to begin such monitoring. If, due to circumstances beyond its the Permittee's control, that any monitoring equipment required by this permit cannot be installed and operated within no later than ninety (90) days after permit issuance, the Permittee may extend the**

compliance schedule related to the equipment for an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management
Compliance **and Enforcement** Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224
***~~

The notification which shall be submitted by the Permittee does require ~~the a~~ certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

~~Unless otherwise specified in the approval for the new emission unit(s), compliance monitoring for new emission units or emission units added through a permit revision shall be implemented when operation begins.~~

~~C.13 Compliance Monitoring [326 IAC 2-1.1-11]~~

~~Compliance with applicable requirements shall be documented as required by this permit. The Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related to that equipment. All monitoring and record keeping requirements not already legally required shall be implemented when operation begins.~~

~~C.14 Monitoring Methods [326 IAC 3] [40 CFR 60] [40 CFR 63]~~

~~Any monitoring or testing required by Section D of this permit shall be performed according to the provisions of 326 IAC 3, 40 CFR 60, Appendix A, 40 CFR 60 Appendix B, 40 CFR 63, or other approved methods as specified in this permit.~~

~~C.152 Instrument Specifications [326 IAC 2-1.1-11] [326 IAC 2-8-4(3)][326 IAC 2-8-5(1)]~~

(a) When required by any condition of this permit, an analog instrument used to measure a parameter related to the operation of an air pollution control device shall have a scale such that the expected maximum reading for the normal range shall be no less than twenty percent (20%) of full scale. **The analog instrument shall be capable of measuring values outside of the normal range.**

(b) ***

~~C.163 Risk Management Plan [326 IAC 2-8-4] [40 CFR 68]~~

~~***~~

~~C.174 Response to Excursions or Exceedances [326 IAC 2-8-4] [326 IAC 2-8-5]~~

~~(a) Upon detecting an excursion or where a response step is required by the D Section or an exceedance of a limitation in this permit:~~

(a) The Permittee shall **take reasonable response steps** to restore operation of the emissions unit (including any control device and associated capture system) to its normal or usual manner of operation as expeditiously as practicable in accordance with good air pollution control practices for minimizing **excess** emissions.

- (b) The response shall include minimizing the period of any startup, shutdown or malfunction ~~and taking any necessary corrective actions to restore normal operation and prevent the likely recurrence of the cause of an excursion or exceedance (other than those caused by excused startup or shutdown conditions).~~ ~~Corrective actions~~ **The response** may include, but ~~are~~ **is** not limited to, the following:
- (1) ***
 - (2) recording that operations returned **or are returning** to normal without operator action (such as through response by a computerized distribution control system); or
 - (3) any necessary follow-up actions to return operation to **normal or usual manner of operation** ~~within the indicator range, designated condition, or below the applicable emission limitation or standard, as applicable.~~
- (c) ***
- (1) ***
 - (2) review of operation and maintenance procedures and records; **and/or**
 - (3) ***
- (d) ***
- (e) The Permittee shall ~~maintain record~~ the following records:
- (1) ~~monitoring data;~~
 - (2) ~~monitor performance data, if applicable; and~~
 - (3) ~~corrective actions~~ **reasonable response steps** taken.

C.185 Actions Related to Noncompliance Demonstrated by a Stack Test [326 IAC 2-8-4][326 IAC 2-8-5]

- (a) When the results of a stack test performed in conformance with Section C - Performance Testing, of this permit exceed the level specified in any condition of this permit, the Permittee shall ~~take appropriate response actions. The Permittee shall submit a description of these its response actions to IDEM, OAQ, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize excess emissions from the affected facility while the response actions are being implemented.~~ **no later than seventy-five (75) days of receipt after the date of the test results.** The Permittee shall take appropriate action to minimize excess emissions from the affected facility while the response actions are being implemented.
- (b) A retest to demonstrate compliance shall be performed ~~within~~ **no later than** one hundred ~~twenty (120) days of receipt of the original date of the test results.~~ **eighty (180) days of receipt after the original date of the test results.** Should the Permittee demonstrate to IDEM, OAQ that retesting in one-hundred **eighty (180)** ~~and twenty (120)~~ days is not practicable, IDEM, OAQ may extend the retesting deadline.
- (c) ***

The response action documents submitted pursuant to this condition do require ~~the~~ **a** certification **that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

C.196 General Record Keeping Requirements[326 IAC 2-8-4(3)] [326 IAC 2-8-5]

- (a) Records of all required monitoring data, reports and support information required by this permit shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. **Support information includes the following, where applicable:**

- (AA) All calibration and maintenance records.
- (BB) All original strip chart recordings for continuous monitoring instrumentation.
- (CC) Copies of all reports required by the FESOP.

Records of required monitoring information include the following, where applicable:

- (AA) The date, place, as defined in this permit, and time of sampling or measurements.
- (BB) The dates analyses were performed.
- (CC) The company or entity that performed the analyses.
- (DD) The analytical techniques or methods used.
- (EE) The results of such analyses.
- (FF) The operating conditions as existing at the time of sampling or measurement.

These records shall be physically present or electronically accessible at the source location for a minimum of three (3) years. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner ~~or OES~~ makes a request for records to the Permittee, the Permittee shall furnish the records to the Commissioner ~~or OES~~ within a reasonable time.

- (b) Unless otherwise specified in this permit, **for** all record keeping requirements not already legally required, **the Permittee** shall be implemented within **allowed up to ninety (90) days from the date of permit issuance or the date of initial start-up, whichever is later, to begin such record keeping.**

C.2017 General Reporting Requirements [326 IAC 2-8-4(3)(C)] [326 IAC 2-1.1-11]

- (a) The Permittee shall submit the attached Quarterly Deviation and Compliance Monitoring Report or its equivalent. **Proper notice submittal under Section B - Emergency Provisions satisfies the reporting requirements of this paragraph.** Any deviation from permit requirements, the date(s) of each deviation, the cause of the deviation, and the response steps taken must be reported **except that a deviation required to be reported pursuant to an applicable requirement that exists independent of this permit, shall be reported according to the schedule stated in the applicable requirement and does not need to be included in this report.** This report shall be submitted ~~within~~ **not later than** thirty (30) days ~~of~~ **after** the end of the reporting period. The Quarterly Deviation and Compliance Monitoring Report shall include ~~the a~~ **certification that meets the requirements of 326 IAC 2-8-5(a)(1)** by an "authorized individual" as defined by 326 IAC 2-1.1-1(1). **A deviation is an exceedance of a permit limitation or a failure to comply with a requirement of the permit.**
- (b) ~~The address for report submittal is required in (a) of this condition and reports required by conditions in Section D of this permit shall be submitted to:~~

Indiana Department of Environmental Management
Compliance **and Enforcement Branch** ~~Data Section~~, Office of Air Quality
100 North Senate Avenue

MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

~~Office of Environmental Services
Administration Building
2700 South Belmont Ave.
Indianapolis, IN 46224~~

- (c) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ on or before the date it is due.
- (d) Reporting periods are based on calendar years, unless otherwise specified in this permit. For the purpose of this permit "calendar year" means the twelve (12) month period from January 1 to December 31 inclusive.

C.2418 Compliance with 40 CFR 82 and 326 IAC 22-1

Pursuant to 40 CFR 82 (Protection of Stratospheric Ozone), Subpart F, except as provided for motor vehicle air conditioners in Subpart B, the Permittee shall comply with **applicable** the standards for recycling and emissions reduction.:

- (a) ~~Persons opening appliances for maintenance, service, repair, or disposal must comply with the required practices pursuant to 40 CFR 82.156.~~
- (b) ~~Equipment used during the maintenance, service, repair, or disposal of appliances must comply with the standards for recycling and recovery equipment pursuant to 40 CFR 82.158.~~
- (c) ~~Persons performing maintenance, service, repair, or disposal of appliances must be certified by an approved technician certification program pursuant to 40 CFR 82.161.~~

Section D.1 - Modifications

- (a) Section D.1 has been removed. The boilers now only burn natural gas and the units have been moved to section D.2.

Section D.1 has been Modified as follows:

~~SECTION D.1 FACILITY OPERATION CONDITIONS~~

Emissions Unit Description:

- (a) ~~350 HP Loeffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas and Distillate #4, Residual #4 and recycled Fuel Oil fired, identified as Emission Unit ID #1~~
- (b) ~~600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas and Distillate #4, Residual #4 and recycled Fuel Oil fired, identified as Emission Unit ID #2~~

~~(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)~~

~~Emission Limitations and Standards [326 IAC 2-8-4(1)]~~

~~D.1.1 Fuel Usage Limitation [326 IAC 7-1.1-1] [326 IAC 12-1] [326 IAC 2-8-4]~~

~~(a) The following limits shall apply for the 11.7 million Btu per hour boiler (emissions unit EU#1):~~

~~(1) The sulfur content of distillate oil combusted shall not exceed 0.5% by weight.~~

~~(2) The sulfur content of residual oil and recycled oil combusted shall not exceed 0.9% by weight.~~

~~(3) The total gallons of recycled oil, residual oil and the distillate oil equivalence for residual oil combusted in the 11.7 MMBtu per hour boiler (emissions unit EU #1) shall not exceed 715.20 kilogallons per twelve (12) consecutive month period, with compliance determined at the end of each month. The distillate oil equivalence shall be calculated by multiplying the amount distillate oil combusted by a correction factor of 0.447.~~

~~(b) The sulfur content of fuel oil combusted in the 20.1 million Btu per hour boiler (emissions unit EU#2) shall not exceed to 0.5% by weight. Pursuant to 40 CFR 60 Subpart Dc, the fuel oil sulfur content limit applies at all times, including periods of startup, shutdown, and malfunction.~~

~~Compliance with these sulfur content and amount of fuel oils combusted limits, shall limit the VOC emissions to less than 100 tons per twelve (12) consecutive month period assuring compliance with the requirements of 326 IAC 7-1.1-2 (Sulfur Dioxide Emission Limitations) and render the requirements of 326 IAC 2-7 (Part 70) does not apply.~~

~~D.1.2 Particulate [326 IAC 6-2-4]~~

~~Pursuant to 326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating), the PM emissions from the following units shall be limited to Pt pounds per MMBtu heat input, as follows:~~

Emission Unit	Unit ID	Pt (lb/MMBtu)
350 HP Leffel boiler	#1	0.57
600 HP Kewanee boiler	#2	0.44

~~D.1.3 HAPs [326 IAC 2-8-4]~~

~~Pursuant to 326 IAC 2-8-4 (FESOP) the HCl emissions from recycled fuel oil combusted in the two (2) boilers shall not exceed 8.6 tons per 12 consecutive month period, with compliance determined at the end of each month. This usage limit is required to limit the source-wide potential to emit of HCl and any combination of HAPs to less than 10 and 25 tons per 12 consecutive month period, respectively. Compliance with this limit makes 326 IAC 2-7 not applicable.~~

~~D.1.4 Preventive Maintenance Plan [326 IAC 2-8-4(9)]~~

~~A Preventive Maintenance Plan is required for these facilities and any control devices. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.~~

Compliance Determination Requirements

~~D.1.5 Sulfur Dioxide Emissions and Sulfur Content~~

- ~~(a) Pursuant to 40 CFR 60, Subpart Dc, the Permittee shall demonstrate compliance utilizing one of the following options:~~
- ~~(1) Providing vendor analysis of fuel delivered, if accompanied by a vendor certification; or~~
 - ~~(2) Analyzing the oil sample to determine the sulfur content of the oil via the procedures in 40 CFR 60, Appendix A, Method 19.~~
 - ~~(A) Oil samples may be collected from the fuel tank immediately after the fuel tank is filled and before any oil is combusted; and~~
 - ~~(B) If a partially empty fuel tank is refilled, a new sample and analysis would be required upon filling.~~
- ~~(b) Analyzing each batch of recycled oil delivered to the fuel tank to determine the sulfur content of the oil via on-site certified laboratory analysis.~~

~~D.1.6 Chlorine Content~~

~~Compliance shall be determined utilizing one of the following options.~~

~~The Permittee shall analyze the recycled oil sample to determine the chlorine content of the oil via on-site certified laboratory analysis, as follows:~~

- ~~(a) Oil samples shall be collected from the fuel tank immediately after the fuel tank is filled and before any oil is combusted; or~~
- ~~(b) If a partially empty fuel tank is refilled, a new sample and analysis would be required upon filling.~~

~~Compliance Monitoring Requirements [326 IAC 2-8-4] [326 IAC 2-8-5(a)(1)]~~

~~D.1.7 Visible Emissions Notations~~

- ~~(a) Visible emission notations of the two (2) boilers stack exhausts shall be performed once per day during normal daylight operations when burning oil. A trained employee shall record whether emissions are normal or abnormal.~~
- ~~(b) For processes operated continuously, "normal" means those conditions prevailing, or expected to prevail, eighty percent (80%) of the time the process is in operation, not counting startup or shut down time.~~
- ~~(c) In the case of batch or discontinuous operations, readings shall be taken during that part of the operation that would normally be expected to cause the greatest emissions.~~
- ~~(d) A trained employee is an employee who has worked at the plant at least one (1) month and has been trained in the appearance and characteristics of normal visible emissions for that specific process.~~
- ~~(e) If abnormal emissions are observed, the Permittee shall take responsible response. Section C - Response to Excursions and Exceedances contains the Permittee's obligation with regard to the response steps required by this condition. Failure to take response steps required by this condition shall be considered a violation of this permit.~~

~~Record Keeping and Reporting Requirements [326 IAC 2-8-4(3)] [326 IAC 2-8-16]~~

~~D.1.8 Record Keeping Requirements~~

- ~~(a) To document the compliance status with Condition D.1.1(b), the Permittee shall maintain records in accordance with (1) through (6) below. Note that pursuant to 40 CFR 60 Subpart Dc, the fuel oil sulfur limit applies at all times including periods of startup, shutdown, and malfunction.~~

- ~~(1) Calendar dates covered in the compliance determination period;~~
- ~~(2) Actual fuel oil usage since last compliance determination period and equivalent sulfur dioxide emissions;~~
- ~~(3) A certification, signed by the owner or operator, that the records of the fuel supplier certifications represent all of the fuel combusted during the period, the natural gas fired boiler certification does require the certification by the "authorized individual" as defined by 326 IAC 2-1.1-1(1); and~~

~~If the fuel supplier certification is used to demonstrate compliance the following, as a minimum, shall be maintained:~~

- ~~(4) Fuel supplier certifications;~~
- ~~(5) The name of the fuel supplier; and~~
- ~~(6) A statement from the fuel supplier that certifies the sulfur content of the fuel oil.~~

~~The Permittee shall retain records of all recording/monitoring data and support information for a period of five (5) years, or longer if specified elsewhere in this permit, from the date of the monitoring sample, measurement, or report. Support information includes all calibration and maintenance records and all original strip-chart recordings for continuous monitoring instrumentation, and copies of all reports required by this permit.~~

- ~~(b) To document the compliance status with Condition D.1.1(a), the Permittee shall maintain records of the monthly sum of distillate and residual oil combusted in the 11.7 million Btu per hour boiler (emission unit EU# 1).~~
- ~~(c) To document the compliance status with Condition D.1.3, the Permittee shall maintain records in accordance with (1) through (5) below.~~

- ~~(1) Calendar dates covered in the compliance determination period;~~
- ~~(2) Results of filled-tank recycled oil analysis (percent chlorine by weight);~~
- ~~(3) A certification, signed by the owner or operator, that the results of fuel oil analysis represent all of the recycled fuel oil combusted during the period; and~~
- ~~(4) Monthly amount of recycled fuel oil combusted and calculated HCl emissions. Monthly HCl emissions shall be calculated as follows:~~

$$\text{E} = \text{A} \times \text{B} \times \text{C} \times \text{D} \times \frac{1 \text{ ton}}{2000 \text{ lbs}}$$

~~Where A = The recycled oil usage, in kilogallons per month.~~
~~B = The density of recycled oil, lb of oil/kgal.~~

~~C = Weight % chlorine in recycled oil~~
~~D = Stoichiometric ratio of HCl produced per mole of Cl_2 reacted (73/71)~~
~~E = Monthly HCl emissions~~

~~(5) The weight of HCl emitted for each compliance period.~~

~~(d) To document the compliance status with Condition D.1.7, the Permittee shall maintain records of visible emission notations of the two (2) boilers once per day.~~

~~(e) Section C - General Record Keeping Requirements contains the Permittee's obligation with regard to the records required by this condition.~~

D.1.9 Reporting Requirements

~~A quarterly report of natural gas boiler certification and a quarterly summary of the information to document the compliance status with D.1.3 shall be submitted not later than thirty (30) days after the end of the quarter being reported. Section C - General Reporting contains the Permittee's obligation with regard to the reporting required by this condition.~~

~~The report submitted by the Permittee does require a certification that meets the requirements of 326 IAC 2-7-6(1) by a "responsible official," as defined by 326 IAC 2-7-1 (35).~~

~~The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).~~

D.1.10 Used Oil Requirements [329 IAC 13]

~~The waste oil burned in the two (2) boilers shall comply with the used oil requirements specified in 329 IAC 13 (Used Oil Management). Pursuant to 329 IAC 13-3-2 (Used Oil Specifications), used oil burned for energy recovery that is classified as off-specification used oil fuel shall comply with the provisions of 329 IAC 13-8 (Used Oil Burners Who Burn Off-specification Used Oil For Energy Recovery), including:~~

~~(a) Receipt of an EPA identification number as outlined in 329 IAC 13-8-3 (Notification),~~

~~(b) Compliance with the used oil storage requirements specified in 329 IAC 13-8-5 (Used Oil Storage), and~~

~~(c) Maintaining records pursuant to 329 IAC 13-8-6 (Tracking).~~

~~The burning of mixtures of used oil and hazardous waste that is regulated under 329 IAC 3.1 is prohibited at this source.~~

Section D.2 (now D.1) - Modifications

- (a) New limits have been added to insure that the source stay under 100 tons for all criteria pollutants.
- (b) Testing, sampling and monitoring has been added to insure the scrubber system is working correctly.
- (c) Section D.2 has been revised to incorporate the appropriate IDEM updates detailed above under "Summary of IDEM Updates Throughout the Permit."

Section D.2 (now D.1) has been Modified as follows:

Facility Description [326 IAC 2-8-4(10)]:

- (j) — Vent and scrubber system serving the outside oil processing tanks and dryer tanks shown in table A-1 solely for odor control. (See condition A.3 (j) table A-1)

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

SECTION D.1

FACILITY OPERATION CONDITIONS

Emissions Unit Description:

- (c) Heated Production tanks, for the separation of waste products and final product streams, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
P1	14,055	June 2010	Steam Injection
P2	21,698	June 2010	Steam Injection
P3	21,698	1996	Steam Injection
P4	21,698	June 2010	Steam Injection
P5	21,698	June 2010	Steam Injection
P6	21,698	June 2010	Steam Injection
P7	21,698	June 2010	Steam Injection
P8	21,698	June 2010	Steam Injection
P9	21,698	March 2013	Steam Injection
P10	30,079	1996	Steam Injection
P11	30,079	1996	Steam Injection
P12	30,079	1996	Steam Injection
P13	30,079	1996	Steam Injection
P14	21,018	July 2003	Steam Injection
P15	21,536	July 2003	Steam Injection
SHT2	21,995	June 1991	Steam Injection

- (d) Heated Water tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
W8	25,908	1996	Steam Injection

- (e) Heated Product tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
D1	12,034	2005	Heat Exchanger
D2	11,664	1996	Heat Exchanger
D3	11,134	1996	Heat Exchanger
D4	17,164	1996	Heat Exchanger
D5	17,164	2001	Heat Exchanger

- (f) Heated Product tanks, with emissions controlled by the Sodium Bi-sulfite Injection Scrubber.

Tank	Size	Year Installed	Heat Source
K1	14,381	June 2012	Heat Exchanger

K2	16,073	July 2012	Heat Exchanger
K3	23,512	June 2011	Heat Exchanger
(g) Heated Incoming Water Oil tanks venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
W2	19,431	1996	Steam Injection
W3	17,842	1996	Steam Injection
W4	21,995	1996	Steam Injection
W5	21,995	1996	Steam Injection
W6	21,995	1996	Steam Injection
W7	21,995	1996	Steam Injection
(h) Heated Waste Water tanks venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
FET2	22,022	1996	Steam Injection
FET3	20,402	1996	Steam Injection
FET4	17,488	1996	Steam Injection
(i) Heated Oil/Water separation tank venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
Big Pit	60,000	pre-1993	Steam Injection
(j) Heated Oil tanks venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
M1	1,151	1992	Heat Exchanger
M2	7,637	January 2013	Heat Exchanger
M3	6,175	1992	Heat Exchanger
M4	7,637	1992	Heat Exchanger
M5	7,637	1992	Heat Exchanger
(k) Heated Blending and Storage tanks, blending of final product streams, venting to the atmosphere.			
Tank	Size	Year Installed	Heat Source
B10	15,545	pre-1993	Heat Exchanger
B14	11,848	pre-1993	Heat Exchanger
B19	18,459	pre-1993	Heat Exchanger
B20	11,335	pre-1993	Heat Exchanger
B26	18,349	pre-1993	Heat Exchanger
B27	19,055	pre-1993	Heat Exchanger
B28	20,292	pre-1993	Heat Exchanger
B31	10,636	pre-1993	Heat Exchanger
B32	27,970	pre-1993	Heat Exchanger
B33	27,970	pre-1993	Heat Exchanger
B34	26,504	pre-1993	Heat Exchanger
B36	29,609	pre-1993	Heat Exchanger
B37	26,504	pre-1993	Heat Exchanger
B42	7,753	pre-1993	Heat Exchanger
B44	19,159	pre-1993	Heat Exchanger
B45	4,505	pre-1993	Heat Exchanger
B50	10,363	pre-1993	Heat Exchanger

(l) Unheated tanks for blending and storage of final product, venting to the atmosphere:			
Tank	Vent to:	Size	Year Installed
B1	Outdoor	13,107	pre-1993
B11	Outdoor	4,505	pre-1993
B12	Outdoor	4,505	pre-1993
B13	Outdoor	4,505	pre-1993
B15	Outdoor	19,431	pre-1993
B16	Outdoor	16,075	pre-1993
B17	Outdoor	18,459	pre-1993
B18	Outdoor	18,459	pre-1993
B2	Outdoor	19,159	pre-1993
B21	Outdoor	5,710	pre-1993
B22	Outdoor	5,076	pre-1993
B23	Outdoor	5,076	pre-1993
B24	Outdoor	10,583	pre-1993
B25	Outdoor	18,897	pre-1993
B29	Outdoor	8,054	pre-1993
B3	Outdoor	19,159	pre-1993
B30	Outdoor	9,198	pre-1993
B35	Outdoor	29,609	pre-1993
B38	Outdoor	29,609	pre-1993
B39	Outdoor	29,609	pre-1993
B4	Outdoor	30,079	pre-1993
B40	Outdoor	7,010	pre-1993
B41	Outdoor	8,662	pre-1993
B43	Outdoor	7,423	pre-1993
B46	Outdoor	21,995	pre-1993
B47	Outdoor	25,702	1996
B48	Outdoor	18,135	1996
B49	Outdoor	20,079	pre-1993
B50	Outdoor	19,107	pre-1993
B51	Outdoor	20,351	pre-1993
B52	Outdoor	30,455	pre-1993
B53	Outdoor	2,133	1993
B54	Outdoor	2,133	1993
B55	Outdoor	2,133	1993
B6	Outdoor	18,459	pre-1993
B7	Outdoor	19,755	pre-1993
B8	Outdoor	20,726	pre-1993
B9	Outdoor	19,159	pre-1993
B99	Outdoor	10,000	pre-1993
(m) Unheated Waste Water tanks venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
A4	Outdoor	14,102	April 1997
C2	Outdoor	12,925	October 1992
C3	Outdoor	12,925	October 1992
FET1	Indoor	15,545	2003
Small Pit	Indoor	10,854	October 1993
Small Pit	Indoor	10,854	October 1993
(n) Unheated Additive Storage tanks venting to the atmosphere.			

Tank	Vent to:	Size	Year Installed
Acid	Indoor	5,922	1996
Alum1	Indoor	5,264	2001
Alum2	Indoor	4,136	2001
Caustic	Indoor	6,862	1996
Coagulant	Indoor	7,520	2001
Polymer	Indoor	7,637	2001
(o) Unheated Product Storage tank venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
SHT1	Indoor	11,497	2000
(p) Unheated Waste Oil Storage tanks venting to the atmosphere.			
Tank	Vent to:	Size	Year Installed
ST10	Outdoor	30,079	1996
ST11	Outdoor	20,079	1996
ST13	Outdoor	11,658	1996
ST14	Outdoor	15,545	1996
ST3	Outdoor	21,374	1996
ST42	Outdoor	42,297	1996
ST5	Outdoor	25,908	1996
ST6	Outdoor	25,908	1996
ST9	Outdoor	19,431	1996
(q) One (1) Sodium Bi-sulfite Scrubber, constructed in 1980, exhausting to stack S-01.			
(The information describing the process contained in this emissions unit description box is descriptive information and does not constitute enforceable conditions.)			

Emission Limitations and Standards [326 IAC 2-8-4(1)]

D.1.1 FESOP, PSD, Emission Offset ,and HAPs Minor Limits [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]

Pursuant to 326 IAC 2-8-4 (FESOP) and in order to render the requirements of 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants), 326 IAC 2-2 (Prevention of Significant Deterioration (PSD)) and 326 IAC 2-3 (Emission Offset) not applicable, the permittee shall comply with the following:

- (a) VOC, HAPs and SO₂ emissions from the following tanks shall be controlled by the Sodium Bi-sulfite Scrubber.

Tank	Size	Year Installed
<i>Heated Production Tanks</i>		
P1	14,055	June 2010
P2	21,698	June 2010
P3	21,698	1996
P4	21,698	June 2010
P5	21,698	June 2010
P6	21,698	June 2010
P7	21,698	June 2010
P8	21,698	June 2010
P9	21,698	March 2013

P10	30,079	1996
P11	30,079	1996
P12	30,079	1996
P13	30,079	1996
P14	21,018	July 2003
P15	21,536	July 2003
SHT2	21,995	June 1991
<i>Heated Water Tanks</i>		
W8	25,908	1996
<i>Heated Product Tanks</i>		
D1	12,034	2005
D2	11,664	1996
D3	11,134	1996
D4	17,164	1996
D5	17,164	2001
<i>Heated Product Tanks</i>		
K1	14,381	June 2012
K2	16,073	July 2012
K3	23,512	June 2011

- (b) The temperature of each tank routed to the Sodium Bi-sulfite Scrubber shall not exceed 210°F (99°C).
- (c) VOC emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (d) Emissions of any single HAP from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed nine (9) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (e) Total HAPs emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall not exceed twenty-four (24) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.
- (f) Total SO₂ emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) shall be less than ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

Compliance with these limits, combined with the potential to emit of SO₂, VOC and HAPs from all other units at the source, shall limit the source-wide potential to emit of SO₂ and VOC, each, to less than hundred (100) tons per twelve (12) consecutive month period, a single HAP to less than ten (10) tons per twelve (12) consecutive month period, and the total HAPs to less than twenty-five (25) tons per twelve (12) consecutive month period and shall render the requirements of 326 IAC 2-7 (Part 70 Permit Program) 326 IAC 2-2 (PSD), 326 IAC 2-3 (Emission Offset), and 326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants) and not applicable.

~~D.2.1 Preventive Maintenance Plan [326 IAC 2-8-4(9)]~~

~~A Preventive Maintenance Plan, in accordance with Section B—Preventive Maintenance Plan, of this permit, is required for this facility and any control devices.~~

D.1.2 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan is required for these facilities and any control devices.

Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

Compliance Determination Requirement

D.21.23 Scrubber Operation [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

D.1.4 SO₂, VOC, and HAPs Control

In order to ensure compliance with Condition D.1.1, the scrubber system serving the tanks for VOC control shall be in operation and control emissions from the tanks at all times the tanks are operating or holding liquid.

D.1.5 Testing Requirements [326 IAC 2-1.1-11]

- (a) Not later than 180 days after the issuance date of this permit, Permit No F097-32513-00139, the Permittee shall perform VOC (including emission rate, removal efficiency, and capture efficiency) testing of the scrubber system utilizing methods approved by the commissioner at least once every 2.5 years from the date of the most recent valid compliance demonstration.**
- (b) Not later than 180 days after the issuance date of this permit, Permit No F097-32513-00139, the Permittee shall perform HAPs (including emission rate, removal efficiency, and capture efficiency) testing of the scrubber system commissioner at least once every 2.5 years from the date of the most recent valid compliance demonstration. Testing shall be conducted for the HAP used at the source that has the lowest destruction efficiency, as estimated by the source 74 and approved by IDEM.**
- (c) Not later than 180 days after the issuance date of this permit, Permit No F097-32513-00139, the Permittee shall perform SO₂ (including emission rate, removal efficiency, and capture efficiency) testing of the scrubber system utilizing methods approved by the commissioner at least once every 2.5 years from the date of the most recent valid compliance demonstration.**

Testing shall be conducted in accordance with the provisions of 326 IAC 3-6 (Source Sampling Procedures). Section C – Performance Testing contains the Permittee's obligation with regard to the performance testing required by this condition.

D.1.6 SO₂, VOC and HAPs Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3][326 IAC 2-4.1]

Compliance with the SO₂, VOC and HAPs limits in Condition D.1.1 shall be determined as follows:

- (a) The Permittee shall determine the sulfur, VOC and HAPs content of each shipment of waste product received by the following:**
 - (1) Providing vendor analysis of waste product delivered, if accompanied by a vendor certification, or;**
 - (2) The shipment of waste product received shall be sampled and analyzed by an independent laboratory, utilizing the appropriate American Society for**

Testing and Materials (ASTM) standards for sampling and chemical analysis. Sampling and analysis shall be conducted as follows:

- (A) The sample acquisition points shall be at locations where representative samples of the respective material shipments may be obtained.**
 - (B) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.**
 - (C) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.**
 - (b) The Permittee shall determine the sulfur, VOC and HAPs content of each additive used in the processing of waste received by the following:**
 - (1) Providing vendor analysis of additive, if accompanied by a vendor certification, or material safety data sheets (MSDS), or;**
 - (2) The shipment of additive shall be sampled and analyzed by an independent laboratory, utilizing the appropriate American Society for Testing and Materials (ASTM) standards for sampling and chemical analysis. Sampling and analysis shall be conducted as follows:**
 - (A) The sample acquisition points shall be at locations where representative samples of the respective additive may be obtained.**
 - (B) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.**
 - (C) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.**
 - (c) If the amount of sulfur, VOC, and HAPs in final product (oil) is deducted from the monthly SO₂, VOC, or HAPs emissions, the Permittee shall determine the sulfur, VOC and HAP content of each tank of final product (oil) prior to shipment by the following:**
 - (1) On-Site Sampling; or,**
 - (A) Each tank of final product (oil) shall be tested on-site utilizing the same American Society for Testing and Materials (ASTM) standards for sampling and chemical analysis conducted for the waste oil received shipments or an alternative method approved by IDEM, OAQ. Sampling and analysis shall be conducted as follows:**
 - (i) The sample acquisition points shall be at locations where representative samples of the respective material shipments may be obtained.**
 - (ii) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.**

- (iii) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.
- (2) Each tank of final product (oil) received shall be sampled and analyzed by an independent laboratory, utilizing the appropriate American Society for Testing and Materials (ASTM) standards for sampling and chemical analysis. Sampling and analysis shall be conducted as follows:
 - (A) The sample acquisition points shall be at locations where representative samples of the respective material shipments may be obtained.
 - (B) Minimum sample size shall be in accordance with ASTM specifications for representative samples in the size fraction and quantity delivered.
 - (C) Samples shall be composited, prepared and analyzed in accordance with ASTM specifications.
- (c) In lieu of determining the HAPs content of the final product (oil) shipped or the waste oil received, the source may treat the entire VOC content as a single HAP.

D.1.7 SO₂ and VOC Emissions [326 IAC 2-8-4][326 IAC 2-2][326 IAC 2-3]

- (a) The Permittee shall determine the calendar month SO₂ emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with the following methodology using the input values determined in D.1.6 above:

$$SO_2 = \left[\left(\sum_{i=1}^N SULFUR_{RECEIVED(i)} + \sum_{i=1}^N SULFUR_{ADDITIVES(i)} \right) \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} - \left(SO_{2EMITTED} / \left(1 - \frac{CE_{SO_2}}{100} \right) \right) - \left(\sum_{i=1}^N SULFUR_{SHIPPED(i)} \times \frac{2 \text{ lb } SO_2}{\text{lb Sulfur}} \right) \right] / \left[2,000 \frac{\text{lbs}}{\text{ton}} \right]$$

Where:

- SO₂ = SO₂ emitted (tons/month)
- SULFUR_{RECEIVED} = Sulfur content of each shipment of waste product received for each month (lbs Sulfur/shipment)
- SULFUR_{ADDITIVES} = Sulfur content of additive used for each month (lbs Sulfur/lb additive)
- SO_{2EMITTED} = SO₂ emitted from the scrubber as determined by the SO₂ CEMS (lbs SO₂/month)
- CE_{SO₂} = Overall SO₂ control efficiency of the scrubber (including emission rate, removal efficiency, and capture efficiency)
- SULFUR_{SHIPPED} = Sulfur content of each shipment of final product (lbs Sulfur/shipment)

- (1) CE_{SO₂} shall be equal to 90% unless a lower value is established during the latest compliance demonstration.
- (2) In lieu of deducting the amount of sulfur contained in the final product (oil) (SULFUR_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

- (b) The Permittee shall determine the calendar month VOC emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with the following methodology using the input values determined in D.1.6 above:

$$VOC = \left[\left(\sum_{i=1}^N VOC_{RECEIVED(i)} + \sum_{i=1}^N VOC_{ADDITIVES(i)} \right) - \left(VOC_{EMITTED} / \left(1 - \frac{CE_{VOC}}{100} \right) \right) - \left(\sum_{i=1}^N VOC_{SHIPPED(i)} \right) \right] / \left[2,000 \frac{lbs}{ton} \right]$$

Where:

VOC	=	VOC emitted (tons/month)
VOC _{RECEIVED}	=	VOC content of each shipment of waste product received for each month (lbs VOC/shipment)
VOC _{ADDITIVES}	=	VOC content of additive used for each month (lbs VOC/lb additive)
VOC _{EMITTED}	=	VOC emitted from the scrubber as determined by the VOC CEMS (lbs VOC/month)
CE _{VOC}	=	Overall VOC control efficiency of the scrubber (including emission rate, removal efficiency, and capture efficiency)
VOC _{SHIPPED}	=	VOC content of each shipment of final product (lbs VOC/shipment)

- (1) CE_{VOC} shall be equal to 90% unless a lower value was established during the latest compliance demonstration.
- (2) In lieu of deducting the amount of VOC contained in the final product (oil) (VOC_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

D.1.8 Total HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]

The Permittee shall determine the calendar month total HAPs emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with one of the following methodologies using the input values determined in D.1.6 above:

- (a)

$$HAPs = \left[\sum_{x=1}^N \left(\sum_{i=1}^N HAP(x)_{RECEIVED(i)} + \sum_{i=1}^N HAP(x)_{ADDITIVES(i)} - \sum_{i=1}^N HAP(x)_{SHIPPED(i)} \right) \right] / \left[2,000 \frac{lbs}{ton} \right]$$

Where:

HAPs	=	Total HAPs emitted (tons/month)
------	---	---------------------------------

HAPs_{RECEIVED} = Total HAPs content of each shipment of waste product received for each month (lbs Total HAPs/shipment)
HAPs_{ADDITIVES} = Total HAP content of additive used for each month (lbs Total HAP/lb additive)
HAPs_{SHIPPED} = Total HAPs content of each shipment of final product (lbs Total HAPs/shipment)

- (1) In lieu of deducting the amount of total HAPS contained in the final product (oil) (HAPs_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).
- (b) In lieu of determining total HAPs emissions in accordance with paragraph (a) of this condition, the Permittee may count all VOCs as Volatile Hazardous Air Pollutants (VHAPs) and determine the total HAPs emissions in accordance with the following methodology using the input values determined in D.1.6 above:

$$VHAPs = \left[\left(\sum_{i=1}^N VOC_{RECEIVED(i)} + \sum_{i=1}^N VOC_{ADDITIVES(i)} \right) - \left(VOC_{EMITTED} \cdot \left(1 - \frac{CE_{VHAP}}{100} \right) \right) - \left(\sum_{i=1}^N VOC_{SHIPPED(i)} \right) \right] / \left[2,000 \frac{lbs}{ton} \right]$$

Where:

VHAPs = Total HAPs emitted (tons/month)
VHAP_{RECEIVED} = VOC content of each shipment of waste product received for each month (lbs VOC/shipment)
VHAP_{ADDITIVES} = VOC content of additive used for each month (lbs VOC/lb additive)
VHAP_{EMITTED} = VOC emitted from the scrubber as determined by the VOC CEMS (lbs VOC/month)
CE_{VHAP} = Overall VHAP control efficiency of the scrubber (including emission rate, removal efficiency, and capture efficiency)
VHAP_{SHIPPED} = VOC content of each shipment of final product (lbs VOC/shipment)

- (1) CE_{VHAP} shall be equal to 80% unless a lower value was established during the latest compliance demonstration.
- (2) In lieu of deducting the amount of VOC contained in the final product (oil) (VHAP_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).

D.1.9 Single HAPs Emissions [326 IAC 2-8-4][326 IAC 2-4.1]

The Permittee shall determine the calendar month single HAP emissions from receiving, handling, processing, storage, and treatment (including wastewater and process treatment) in accordance with one of the following methodologies using the input values determined in D.1.6 above:

- (a)

$$HAP(x) = \left[\sum_{i=1}^N HAP(x)_{RECEIVED(i)} + \sum_{i=1}^N HAP(x)_{ADDITIVES(i)} - \sum_{i=1}^N HAP(x)_{SHIPPED(i)} \right] / \left[2,000 \frac{lb}{ton} \right]$$

Where:

- HAP(x) = HAP(x) emitted (tons/month)
HAP(x)_{RECEIVED} = HAP(x) content of each shipment of waste product received for each month (lbs HAP(x)/shipment)
HAP(x)_{ADDITIVES} = HAP(x) content of additive used for each month (lbs HAP(x)/lb additive)
HAP(x)_{SHIPPED} = HAP(x) content of each shipment of final product (lbs HAP(x)/shipment)
(x) = Single HAP

- (1) In lieu of deducting the amount of HAP(x) contained in the final product (oil) (HAP(x)_{SHIPPED}), the source may elect to set all or some of the shipment values to zero (0).
- (b) In lieu of calculating HAP(x) emissions, the Permittee may opt to count the calculated total HAPs or VHAPs emissions, as determined in accordance with Condition D.1.8, as HAP(x) emitted.

D.1.10 Continuous Emissions Monitoring [326 IAC 3-5][326 IAC 2-7-6(1),(6)]

- (a) Pursuant to 326 IAC 3-5 (Continuous Monitoring of Emissions) continuous emission monitoring systems for the scrubber system shall be calibrated, maintained, and operated for measuring the SO₂ and VOC outlet, which meet all applicable performance specifications of 326 IAC 3-5-2.
- (b) All continuous emissions monitoring systems are subject to monitor system certification requirements pursuant to 326 IAC 3-5-3.
- (c) Nothing in this permit shall excuse the Permittee from complying with the requirements to operate a continuous emission monitoring system pursuant to 326 IAC 3-5.

~~D.2.31.11~~ Parametric Monitoring for Scrubber [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

~~D.2.41.12~~ Scrubber Failure Detection [Memorandum of Understanding (MOU), October 11, 2004, City of Indianapolis (plaintiff) vs. Metal Working Lubricants (defendant), Cause Number 04-A-0187]

D.1.13 Tank Temperature

- (a) A continuous monitoring system shall be calibrated, maintained, and operated on the heated tanks for measuring operating temperature. For the purpose of this condition, continuous means no less often than once per fifteen (15) minutes. The

output of this system shall be recorded as 3-hour average. The Permittee shall operate the tanks below the range outlined in Condition D.1.1(b).

- (d) If the temperature exceeds the above mentioned temperature, the Permittee shall take a reasonable response. Section C - Response to Excursions or Exceedances contains the Permittee's obligation with regard to the response steps required by this condition. Failure to take response steps shall be considered a deviation from this permit.

D.1.14 Parametric Monitoring - Sodium Bi-sulfite Injection

The Permittee shall record the sodium bi-sulfite feed rate into the scrubber at least once per day when the tanks are in operation. When, for any one reading, the sodium bi-sulfite feed rate into the scrubber is outside the normal range, the Permittee shall take a reasonable response. The normal range for this unit is a feed rate between 0.053 and 0.28 ft³/hr unless a different upper-bound or lower-bound value for this range is determined during the latest stack test. Section C - Response to Excursions and Exceedances contains the Permittee's obligation with regard to the reasonable response steps required by this condition. A reading that is outside the above mentioned range is not a deviation from this permit. Failure to take response steps shall be considered a deviation from this permit.

D.1.15 SO₂ and VOC Continuous Emissions Monitoring (CEMS) Equipment Downtime

- (a) In the event that a breakdown of a SO₂ and VOC continuous emissions monitoring system (CEMS) occurs, a record shall be made of the time and reason of the breakdown and efforts made to correct the problem.
- (b) Whenever a SO₂ continuous emissions monitoring system (CEMS) is malfunctioning or is down for maintenance or repairs for a period of twenty-four (24) hours or more, a backup SO₂ CEMS shall be brought online.
- (c) Whenever a VOC continuous emissions monitoring system (CEMS) is malfunctioning or is down for maintenance or repairs for a period of twenty-four (24) hours or more, a backup VOC CEMS shall be brought online.

D.1.16 Record Keeping Requirements [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]

- (a) To document the compliance status with Conditions D.1.1 and D.1.6, the Permittee shall maintain records in accordance with (1) and (5) below. Records maintained for (1) and (5) shall be taken monthly and shall be complete and sufficient to establish compliance with the VOC, total HAPs, single HAP, and SO₂ emission limits established in Condition D.1.1, and the requirements of Condition D.1.6, and to document the quantity of any VOC, total HAPs, single HAP, and SO₂ contained in the final product (oil) produced and deducted from total reported VOC, total HAPs, single HAP, and SO₂ emissions and total sulfur, VOC and HAP in the incoming waster and additives. Records necessary to demonstrate compliance shall be available not later than 30 days of the end of each compliance period.
- (1) The VOC, total HAPs, single HAP, and Sulfur content of each waste stream received in accordance with the following:
- (A) Vendor certification of VOC, total HAPs, single HAP, and Sulfur content of each shipment of waste product received in pounds per shipment; or,

- (B) Results of the independent laboratory analysis of VOC, total HAPs, single HAP, and Sulfur content of each shipment of waste product received in pounds per shipment.**

Records shall include purchase orders, invoices and verify the amount and date received.

- (2) The VOC, total HAPs, single HAP, and Sulfur content of each additive used in accordance with the following:**

- (A) Vendor certification of VOC, total HAPs, single HAP, and Sulfur content of additive; or,**
- (B) Results of the independent laboratory analysis of VOC, total HAPs, single HAP, and Sulfur content of each additive; or,**
- (C) Material safety data sheets (MSDS).**

Records shall include purchase orders, invoices and verify the amount and date received.

- (3) The amount of each additive used on a monthly basis.**

- (4) If the amount of VOC, total HAPs, single HAP, and Sulfur in the final product (oil) produced is being deducted from the VOC, total HAPs, single HAP, and SO₂ emissions, then the following records shall be maintained:**

- (A) The amount of final product (oil) produced each month. If multiple final product streams are collected and drummed separately, the amount produced out shall be recorded separately for each stream.**
- (B) The VOC, total HAPs, single HAP, and Sulfur content of each final product stream (oil) produced each month and all records necessary to verify the amount and VOC, HAPs and Sulfur content of the VOC, HAPs and Sulfur in the final products (oil) produced.**
- (C) The weight of VOC, total HAPs, single HAP, and Sulfur in the final product (oil), for each compliance period.**

- (5) The calculated weight of VOC, total HAPs, single HAP, and SO₂ emitted, for each compliance period. Records maintained shall be complete and sufficient verify the calculated results.**

- (b) To document the compliance status with Condition D.1.1, the Permittee shall maintain records of calculations required by Conditions D.1.7, D.1.8, and D.1.9.**
- (c) To document the compliance status with Condition D.1.11, the Permittee shall maintain daily records of the Pressure Drop for the scrubber. The Permittee shall include in its daily record when they are not taken and the reason for the lack of the readings (e.g., the process did not operate that day).**
- (d) To document the compliance status with Condition D.1.12, the Permittee shall maintain continuous temperature records for the heated tanks and the 3-hour average temperature.**

- (e) To document the compliance status with Condition D.1.14, the Permittee shall maintain daily records of the lime feed rate into the sodium bi-sulfite scrubber. The Permittee shall include in its daily record when the sodium bi-sulfite feed rate is not taken and the reason for the lack of sodium bi-sulfite feed rate data (e.g. the process did not operate that day).
- (f) The Permittee shall record the output of the continuous monitoring system in pounds per hour and shall perform the required record keeping pursuant to 326 IAC 3-5-6 and 326 IAC 3-5-7.
- (g) In the event that a breakdown of the SO₂ or VOC continuous emission monitoring systems (CEMS) occurs, the Permittee shall maintain records of all CEMS malfunctions, out of control periods, calibration and adjustment activities, and repair or maintenance activities.
- (h) Section C - General Record Keeping Requirements contains the Permittee's obligation with regard to the records required by this condition.

D.1.17 Reporting Requirements for CEMS [326 IAC 2-7-5(3)(A)(iii)][326 IAC 3-5]

- (a) The Permittee shall prepare and submit to IDEM, OAQ a written report of the results of the calibration gas audits and relative accuracy test audits for each calendar quarter within thirty (30) calendar days after the end of each quarter. The report must contain the information required by 326 IAC 3-5-5(e)(2).

The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (b) Pursuant to 326 IAC 3-5-7(5), reporting of continuous monitoring system instrument downtime, except for zero (0) and span checks, which shall be reported separately, shall include the following:
 - (1) date of downtime;
 - (2) time of commencement;
 - (3) duration of each downtime;
 - (4) reasons for each downtime; and
 - (5) nature of system repairs and adjustments.

The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (c) A quarterly report of VOC, SO₂, single HAPs and Total HAPs emissions shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, within thirty (30) days after the end of the quarter being reported. The report does require a certification that meets the requirements of 326 IAC 2-8-5(a)(1) by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

Section D.3 (now D.2) - Modifications

- (a) Section D.3 has been added to outline the new equipment and the rules the units are subject to.
- (b) Leffel boiler and Kewanee boiler has been added to this section.
- (b) Section D.3 has been revised to incorporate the appropriate IDEM updates detailed above under "Summary of IDEM Updates Throughout the Permit."

Section D.3 (now D.2) has been Modified as follows:

SECTION D.2 EMISSIONS UNIT OPERATION CONDITIONS

Emissions Unit Description:

- (a) **350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas fired, identified as Emission Unit ID #1.**
- (b) **600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas fired, identified as Emission Unit ID #2.**

Specifically Regulated Insignificant Activities:

- (a) **Natural gas-fired combustion sources with heat input equal to or less than ten (10) million Btu per hour:**
 - (1) **Unit Heater - Maintenance, 130 MBH;**
 - (2) **Storage Heater - Maintenance, 175 MBH;**
 - (3) **Unit Heater 1 - Blending, 175 MBH;**
 - (4) **Unit Heater 2 - Blending, 175 MBH;**
 - (5) **Unit Heater 3 - Blending, 175 MBH;**
 - (6) **Make-up Unit - Blending, 175 MBH;**
 - (7) **Unit Heater 1 - Water Treatment, 400 MBH;**
 - (8) **Unit Heater 2 - Water Treatment, 130 MBH;**
 - (9) **Unit Heater 3 - Water Treatment, 130 MBH;**
 - (10) **Make-up Unit - Water Treatment, 985 CFH;**
 - (11) **Individual Water Heater (temp.), 150 MBH;**
 - (12) **Space Heater 1 - Office, 115 MBH;**
 - (13) **Space Heater 2 - Office, 115 MBH;**
 - (14) **Space Heater 3 - Office, 130 MBH.**
- (b) **One (1) portable air compressor with a maximum capacity of 5.5 HP, constructed in**

2011.	
(c)	One (1) diesel fired salamander, with a maximum capacity of 0.4 MMBtu/hr, constructed in 2005.
(d)	One (1) portable power washer with a diesel water heater, identified as Power Washer #1, with a maximum capacity of 0.4 MMBtu/hr, constructed in 1997.
(e)	One (1) portable power washer with a diesel water heater, identified as Power Washer #2, with a maximum capacity of 0.4 MMBtu/hr constructed in 2012.
(The information describing the process contained in this emissions unit description box is descriptive information and does not constitute enforceable conditions.)	

Emission Limitations and Standards [326 IAC 2-8-4(1)]

D.2.1 Particulate Emissions Limitation [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating), the PM emissions from the following units shall be limited to Pt pounds per MMBtu heat input, as follows:

Emission Unit	Pt (lb/MMBtu)
350 HP Leffel boiler (Unit ID: #1)	0.57
600 HP Kewanee boiler (Unit ID: #2)	0.44
Unit Heater - Maintenance	0.44
Storage Heater - Maintenance	0.44
Unit Heater 3 - Blending	0.44
Unit Heater 4 - Blending	0.44
Unit Heater 5 - Blending	0.44
Make-up Unit 1 - Blending	0.44
Unit Heater 1 - Water Treatment	0.44
Unit Heater 2 - Water Treatment	0.44
Unit Heater 3 - Water Treatment	0.44
Individual Water Heater (temp.)	0.44
Unit Heater 1 - Maintenance	0.44
Unit Heater 2 - Maintenance	0.44
Unit Heater 3 - Storage/Meeting area	0.44
Make-up Unit 3 - Maintenance	0.44
Make-up Unit 2 - Water Treatment	0.44
Heated Power Washer #1	0.43
diesel fired salamander	0.43
Heated Power Washer #2	0.43

D.2.2 Preventive Maintenance Plan [326 IAC 2-8-4(9)]

A Preventive Maintenance Plan is required for these facilities and any control devices. Section B - Preventive Maintenance Plan contains the Permittee's obligation with regard to the preventive maintenance plan required by this condition.

E Sections and forms - Modifications

- (a) Section E.1 has been added to the permit to outline the provisions of 40 CFR Part 60, Subpart Dc that the source is subject to.
- (b) These sections have been revised to incorporate the appropriate IDEM updates detailed above under "Summary of IDEM Updates Throughout the Permit."

E Sections and forms has been Modified as follows:

SECTION E.1

NSPS

Emissions Unit Description:

- (a) 350 HP Leffel boiler, 11.7 MMBtu/hr heat input capacity, installed 1987, Natural Gas and Distillate #4, Residual #4 and recycled Fuel Oil fired, identified as Emission Unit ID #1
- (b) 600 HP Kewanee boiler, 20.1 MMBtu/hr heat input capacity, installed May 1993, Natural Gas and Distillate #4, Residual #4 and recycled Fuel Oil fired, identified as Emission Unit ID #2

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

New Source Performance Standards (NSPS) Requirements [326 IAC 2-8-4(1)]

E.1.1 General Provisions Relating to New Source Performance Standards [326 IAC 12-1] [40 CFR Part 60, Subpart A]

- (a) Pursuant to 40 CFR 60.1, the Permittee shall comply with the provisions of 40 CFR Part 60, Subpart A – General Provisions, which are incorporated by reference as 326 IAC 12-1, for the above listed emissions units, except as otherwise specified in 40 CFR Part 60, Subpart Dc.

- (b) Pursuant to 40 CFR 60.4, the Permittee shall submit all required notifications and reports to:

Indiana Department of Environmental Management
Compliance and Enforcement Branch, Office of Air Quality
100 North Senate Avenue
MC 61-53 IGCN 1003
Indianapolis, Indiana 46204-2251

and

United States Environmental Protection Agency, Region V
Air and Radiation Division, Air Enforcement Branch - Indiana (AE-17J)
77 West Jackson Boulevard
Chicago, Illinois 60604-3590

E.1.2 Small Industrial-Commercial-Institutional Steam Generating Units NSPS [326 IAC 12] [40 CFR Part 60, Subpart Dc]

Pursuant to 40 CFR Part 60, Subpart Dc, the Permittee shall comply with the provisions of 40 CFR Part 60, Subpart Dc, which are incorporated by reference as 326 IAC 12 (included as Attachment A to this permit), for the above listed emissions units as specified as follows.

- (1) 40 CFR 60.40c(a),(b),(c)
- (2) 40 CFR 60.41c
- (3) 40 CFR 60.42c(h)(4), (i)
- (4) 40 CFR 60.44c(a), (b), (c)
- (5) 40 CFR 60.46c(e)
- (6) 40 CFR 60.48c(a), (g)(2), (h), (i), (j)

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY

COMPLIANCE AND ENFORCEMENT BRANCH

and

~~CITY OF INDIANAPOLIS
OFFICE OF ENVIRONMENTAL SERVICES~~

FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
CERTIFICATION

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
~~Mailing Address: 1509 South Senate Avenue, Indianapolis IN 46225~~
FESOP Permit No.: F097-~~32513-15365~~**32513**-00139

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY

COMPLIANCE BRANCH

P.O. Box 6015

100 North Senate Avenue

Indianapolis, Indiana 46204-2251

Phone: 317-233-5674

Fax: 317-233-5967

~~CITY OF INDIANAPOLIS~~

~~OFFICE OF ENVIRONMENTAL SERVICES~~

~~DATA COMPLIANCE~~

~~2700 South Belmont Avenue~~

~~Indianapolis, Indiana 46221~~

~~Phone: 317-327-2234~~

~~Fax: 317-327-2274~~

FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
EMERGENCY OCCURRENCE REPORT

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
~~Mailing Address: 1509 South Senate Avenue, Indianapolis IN 46225~~
FESOP Permit No.: F097-~~15365~~**32513**-00139

This form consists of 2 pages

Page 1 of 2

- ☐ This is an emergency as defined in 326 IAC 2-7-1(12)

 - The Permittee must notify the Office of Air Quality (OAQ), within four (4) business hours (1-800-451-6027 or 317-233-~~5674~~**40178**, ask for Compliance Section); and
 - The Permittee must submit notice in writing or by facsimile within two (2) working days (Facsimile Number: 317-233-~~6865~~**5967**), and follow the other requirements of 326 IAC 2-7-16

~~A certification is not required for this report.~~

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH DATA SECTION
and
CITY OF INDIANAPOLIS
OFFICE OF ENVIRONMENTAL SERVICES
DATA COMPLIANCE

FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
SEMI-ANNUAL NATURAL GAS FIRED BOILER CERTIFICATION

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
~~Mailing Address: 1509 South Senate Avenue, Indianapolis IN 46225~~
FESOP Permit No.: F097-~~3251345365~~-00139

- ☐ Natural Gas Only
☐ Alternate Fuel **burned**

~~Attach a signed certification to complete this report.~~

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH

FESOP VOC Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-32513-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: VOC emissions
Limit: **Ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month**

YEAR:

Month	VOC emissions(tons)	VOC emissions(tons)	VOC emissions(tons)
	This Month	Previous 11 Months	12 Month Total

☐ No deviation occurred in this quarter.

☐ Deviation/s occurred in this quarter.
Deviation has been reported on:

Submitted by:

Title / Position:

Signature: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

FESOP SO2 Quarterly Report

Source Name: Metalworking Lubricants Company

Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225

FESOP No.: F097-32513-00139

Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)

Parameter: SO2 emissions

Limit: Ninety-five (95) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

YEAR:

Month	SO2 emissions (tons)	SO2 emissions (tons)	SO2 emissions (tons)
	This Month	Previous 11 Months	12 Month Total

☐ No deviation occurred in this quarter.

☐ Deviation/s occurred in this quarter.
Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

**OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH DATA SECTION**

FESOP SINGLE HAP Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-3251-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: Single HAP emissions
Limit: Nine (9) tons per twelve (12) consecutive month period, with compliance determined at the end of each month

YEAR:

Month	HAP emissions (tons)	HAP emissions (tons)	HAP emissions (tons)
	This Month	previous 11 months	12 Month Total

☐ No deviation occurred in this quarter.

☐ Deviation/s occurred in this quarter.
Deviation has been reported on:

Submitted by:

Title / Position:

Signature: _____

Date: _____

Phone: _____

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE AND ENFORCEMENT BRANCH**

FESOP TOTAL HAPs Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis, IN 46225
FESOP No.: F097-32513-00139
Facility: receiving, handling, processing, storage, and treatment (including wastewater and process treatment)
Parameter: Total HAPs emissions
Limit: Twenty-four (24) tons per twelve (12) consecutive month period, with compliance determined at the end of each month.

YEAR:

	Total HAPs emissions	Total HAPs emissions	Total HAPs emissions
--	----------------------	----------------------	----------------------

Month	(tons)	(tons)	(tons)
	This Month	Previous 11 Months	12 Month Total

☐ No deviation occurred in this quarter.

☐ Deviation/s occurred in this quarter.

Deviation has been reported on: _____

Submitted by: _____

Title / Position: _____

Signature: _____

Date: _____

Phone: _____

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION
and
CITY OF INDIANAPOLIS
~~OFFICE OF ENVIRONMENTAL SERVICES~~
~~DATA COMPLIANCE~~

FESOP Quarterly Report

Source Name: Metalworking Lubricants Company
Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
~~Mailing Address: 1509 South Senate Avenue, Indianapolis IN 46225~~
FESOP Permit No.: F097-~~32513-15365~~-00139

~~Attach a signed certification to complete this report.~~

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

~~FESOP Quarterly Report~~

~~Source Name: Metalworking Lubricants Company~~
~~Source Address: 1509 South Senate Avenue, Indianapolis IN 46225~~
~~FESOP Permit No.: F097-32513-00139~~
~~Facility: EU#1 and EU#2~~

Parameter: ~~Hydrogen Chloride (HCl)~~

Limit: ~~The HCl emissions from recycled fuel oil combusted in the two (2) boilers shall not exceed 8.6 tons per 12 consecutive month period, with compliance determined at the end of each month. The fuel usage shall be calculated as follows:~~

$$E = A \times B \times C \times D \times \frac{1 \text{ ton}}{2000 \text{ lbs}}$$

Where: ~~A = The recycled oil usage, in kilogallons per month.~~

~~B = The density of recycled oil, lb of oil/kgal.~~

~~C = Weight % chlorine in recycled oil~~

~~D = Stoichiometric ratio of HCl produced per mole of Cl₂ reacted (73/71)~~

~~E = Monthly HCl emissions~~

Year: _____

Month	HCl emissions this month (tons)	HCl emissions previous 11 months (tons)	HCl emissions last 12 months (tons)
Month 1			
Month 2			
Month 3			

☐ ~~No deviation occurred in this month.~~

☐ ~~Deviation/s occurred in this month.~~

~~Deviation has been reported on: _____~~

~~Submitted by: _____~~

~~Title/Position: _____~~

~~Signature: _____~~

~~Date: _____~~

~~Phone: _____~~

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
COMPLIANCE DATA SECTION

FESOP Quarterly Report

Source Name: ~~Metalworking Lubricants Company~~

Source Address: ~~1509 South Senate Avenue, Indianapolis IN 46225~~

FESOP Permit No.: ~~F097-32513-00139~~

Facility: ~~EU#1~~

Parameter: ~~Sulfur Dioxide (SO₂)~~

Limit: ~~The total gallons of recycled oil, residual oil and the distillate oil equivalence for residual oil combusted in the 11.7 MMBtu per hour boiler (emissions unit EU #1) shall not exceed 715.20 kilogallons per twelve (12) consecutive month period, with compliance determined at the end of each month and the maximum sulfur content of the recycled oil and the residual oil shall not exceed 1.04% by weight.~~

YEAR: _____

Month	Recycled Oil, Residual Oil (& equivalents) usage this month (gallons)	% sulfur by weight of recycled and residual oil combusted this month	Recycled Oil, Residual Oil (& equivalents usage) previous 11 months (gallons)	% sulfur by weight of recycled and residual oil combusted previous 11 months	Recycled Oil, Residual Oil (& equivalents usage) last 12 months (gallons)	% sulfur by weight of recycled and residual oil combusted last 12 months
Month 1						
Month 2						
Month 3						

_____ ☐ No deviation occurred in this month.

_____ ☐ Deviation/s occurred in this quarter.

_____ Deviation has been reported on: _____
 _____ Submitted by: _____
 _____ Title / Position: _____
 _____ Signature: _____
 _____ Date: _____
 _____ Phone: _____

INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
 OFFICE OF AIR QUALITY
 COMPLIANCE **AND ENFORCEMENT BRANCH DATA SECTION**
 and
 CITY OF INDIANAPOLIS
 OFFICE OF ENVIRONMENTAL SERVICES
 DATA COMPLIANCE

FEDERALLY ENFORCEABLE STATE OPERATING PERMIT (FESOP)
 QUARTERLY DEVIATION AND COMPLIANCE MONITORING REPORT

Source Name: Metalworking Lubricants Company
 Source Address: 1509 South Senate Avenue, Indianapolis IN 46225
 Mailing Address: 1509 South Senate Avenue, Indianapolis IN 46225
 FESOP Permit No.: F097-15365**32513**-00139

Months: _____ to _____ Year: _____

This report shall be submitted quarterly based on a calendar year. **Proper notice submittal under Section B - Emergency Provisions satisfies the reporting requirements of paragraph (a) of Section C - General Reporting.** Any deviation from the requirements of this permit, the date(s) of each deviation, the probable cause of the deviation, and the response steps taken must be reported. Deviations that are **A deviation** required to be reported pursuant to by an applicable requirement that **exists independent of the permit**, shall be reported according to the schedule stated in the applicable requirement and **does** not need to be included in this report. Additional pages may be attached if necessary. If no deviations occurred, please specify in the box marked "No deviations occurred this reporting period".

~~Attach a signed certification to complete this report.~~

Recommendation

The staff recommends to the Commissioner that the FESOP Renewal be approved. This recommendation is based on the following facts and conditions:

Unless otherwise stated, information used in this review was derived from the application and additional information submitted by the applicant.

An application for the purposes of this review was received on October 27, 2003. Additional information was received on June 2, 2014.

Conclusion

The operation of this a stationary waste oil recycling plant shall be subject to the conditions of the attached FESOP Renewal No. F097-32513-00139.

IDEM Contact

- (a) Questions regarding this proposed permit can be directed to Julie Alexander at the Indiana Department Environmental Management, Office of Air Quality, Permits Branch, 100 North Senate Avenue, MC 61-53 IGCN 1003, Indianapolis, Indiana 46204-2251 or by telephone at (317) 233-1782 or toll free at 1-800-451-6027 extension 3-1782.
- (b) A copy of the findings is available on the Internet at: <http://www.in.gov/ai/appfiles/idem-caats/>
- (c) For additional information about air permits and how the public and interested parties can participate, refer to the IDEM Permit Guide on the Internet at: <http://www.in.gov/idem/5881.htm>; and the Citizens' Guide to IDEM on the Internet at: <http://www.in.gov/idem/6900.htm>.

**Appendix A: Emission Calculations
PTE Summary**

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit No.: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

Uncontrolled Potential to Emit (tons/yr)									
Emission Unit	PM	PM10	PM2.5 *	SO ₂	NOx	VOC	CO	CO2e	Total HAPs
Process Emissions	-	-	-	-	-	> 100.00	-	-	> 25.00
Boilers #1&2	0.26	1.04	1.04	0.08	13.66	0.75	11.47	16,484	0.26
Diesel Combustion	0.08	0.09	0.06	0.29	0.90	0.01	0.19	810	2.58E-04
Natural Gas Combustion	0.03	0.10	0.10	0.01	1.37	0.08	1.15	1,652	2.58E-02
Roads	1.53	0.44	0.04	-	-	-	-	-	-
Welding and Thermal Cutting	0.39	0.39	0.39	-	-	-	-	-	2.27E-03
Total	2.28	2.06	1.63	0.38	15.92	> 100.83	12.81	18,946	> 25.29

* PM2.5 listed is direct PM2.5

Potential to Emit after Control (tons/yr)									
Emission Unit	PM	PM10	PM2.5 *	SO ₂	NOx	VOC	CO	CO2	Total HAPs
Process Emissions	-	-	-	-	-	90.00	-	-	22.50
Boilers #1&2	0.26	1.04	1.04	0.08	13.66	0.75	11.47	16483.73	0.26
Diesel Combustion	0.08	0.09	0.06	0.29	0.90	0.01	0.19	810	2.58E-04
Natural Gas Combustion	0.03	0.10	0.10	0.01	1.37	0.08	1.15	1,652	2.58E-02
Roads	1.53	0.44	0.04	-	-	-	-	-	-
Welding and Thermal Cutting	0.39	0.39	0.39	-	-	-	-	-	2.27E-03
Total	2.28	2.06	1.63	0.38	15.92	90.83	12.81	18,946	22.79

* PM2.5 listed is direct PM2.5

Potential to Emit after Issuance (tons/yr)									
Emission Unit	PM	PM10	PM2.5 *	SO ₂	NOx	VOC	CO	CO2	Total HAPs
Process Emissions	-	-	-	-	-	95.00	-	-	15.00
Boilers #1&2	0.26	1.04	1.04	0.08	13.66	0.75	11.47	16,484	0.26
Diesel Combustion	0.08	0.09	0.06	0.29	0.90	0.01	0.19	810	2.58E-04
Natural Gas Combustion	0.03	0.10	0.10	0.01	1.37	0.08	1.15	1,652	0.03
Roads	1.53	0.44	0.04	-	-	-	-	-	-
Welding and Thermal Cutting	0.39	0.39	0.39	-	-	-	-	-	2.27E-03
Total	2.28	2.06	1.63	0.38	15.92	95.83	12.81	18,946	15.29

* PM2.5 listed is direct PM2.5

Note: The shaded cells indicate where limits are included.

**Appendix A: Emission Calculations
HAPs Summary**

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit No.: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

Uncontrolled Potential to Emit (tons/yr)																	
Emission Unit	Arsenic	Beryllium	Benzene	Cadmium	Chromium	Dichlorobenzene	Formaldehyde	Hexane	Lead	Mercury	Manganese	Nickel	Selenium	Trichloroethene	Toluene	Xylene	Total HAPs
Process Emissions*	-	-	0.37	-	-	-	-	-	-	-	-	-	-	0.25	6.36	4.31	> 25.00
Boilers #1&2	-	-	0.00	1.50E-04	1.91E-04	1.64E-04	1.02E-02	2.46E-01	6.83E-05	-	5.19E-05	2.87E-04	-	-	0.00	-	0.26
Diesel Combustion	2.10E-05	1.58E-05	-	1.58E-05	1.58E-05	-	-	-	-	1.58E-05	3.15E-05	1.58E-05	7.88E-05	-	-	-	2.10E-04
Natural Gas Combustion	-	-	2.87E-05	1.51E-05	1.92E-05	1.64E-05	0.00	0.02	6.84E-06	-	5.20E-06	2.87E-05	-	-	4.65E-05	-	2.58E-02
Welding and Thermal Cutting	-	-	-	-	7.10E-04	-	-	-	-	-	1.32E-03	2.37E-04	-	-	-	-	2.27E-03
Total	2.10E-05	1.58E-05	0.37	1.81E-04	9.36E-04	1.80E-04	0.01	0.27	7.51E-05	1.58E-05	1.41E-03	5.68E-04	7.88E-05	0.25	6.36	4.31	> 25.29

* Process Emissions HAP emissions are based on testing data provided by the site.

Potential to Emit after Issuance (tons/yr)																	
Emission Unit	Arsenic	Beryllium	Benzene	Cadmium	Chromium	Dichlorobenzene	Formaldehyde	Hexane	Lead	Mercury	Manganese	Nickel	Selenium	Trichloroethene	Toluene	Xylene	Total HAPs
Process Emissions*	-	-	0.37	-	-	-	-	-	-	-	-	-	-	0.25	6.36	4.31	15.00
Boilers #1&2	-	-	2.87E-04	1.50E-04	0.00	1.64E-04	1.02E-02	0.25	6.83E-05	-	0.00	2.87E-04	-	-	4.64E-04	-	0.26
Diesel Combustion	2.10E-05	1.58E-05	-	1.58E-05	1.58E-05	-	-	-	-	1.58E-05	3.15E-05	1.58E-05	7.88E-05	-	-	-	2.10E-04
Natural Gas Combustion	-	-	2.87E-05	1.51E-05	1.92E-05	1.64E-05	0.00	0.02	6.84E-06	-	5.20E-06	2.87E-05	-	-	4.65E-05	-	2.58E-02
Welding and Thermal Cutting	-	-	-	-	7.10E-04	-	-	-	-	-	1.32E-03	2.37E-04	-	-	-	-	2.27E-03
Total	2.10E-05	1.58E-05	3.73E-01	1.81E-04	9.36E-04	1.80E-04	1.13E-02	2.70E-01	7.51E-05	1.58E-05	1.41E-03	5.68E-04	7.88E-05	2.54E-01	6.36E+00	4.31E+00	15.29

* Process Emissions HAP emissions are based on testing data provided by the site.

Appendix A: Emissions Calculations
Diesel Combustion

Company Name: Metalworking Lubricants Company
Address, City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit Number: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

Facility	Heat input capacity (MMBtu/hr)
Salamander	0.40
Power Washer #1	0.40
Power Washer #2	0.40
Total (MMBtu/hr)	1.20

Heat Input Capacity
MMBtu/hr

1.20

Potential Throughput
kgals/year

75.09

S = Weight % Sulfur

0.05

	Pollutant						
Emission Factor in lb/kgal	PM* 2.0	PM10 2.3	direct PM2.5 1.6	SO2 7.85 (157S)	NOx 24.0	VOC 0.20	CO 5.0
Potential Emission in tons/yr	0.08	0.09	0.06	0.29	0.90	0.01	0.19

*PM emission factor is filterable PM only. Condensable PM emission factor is 1.3 lb/kgal.

	HAPs - Metals				
Emission Factor in lb/mmBtu	Arsenic 4.0E-06	Beryllium 3.0E-06	Cadmium 3.0E-06	Chromium 3.0E-06	Lead 9.0E-06
Potential Emission in tons/yr	2.10E-05	1.58E-05	1.58E-05	1.58E-05	4.73E-05

	HAPs - Metals (continued)			
Emission Factor in lb/mmBtu	Mercury 3.0E-06	Manganese 6.0E-06	Nickel 3.0E-06	Selenium 1.5E-05
Potential Emission in tons/yr	1.58E-05	3.15E-05	1.58E-05	7.88E-05
No data was available in AP-42 for organic HAPs.				Total HAPs 2.575E-04
				Worst HAP 7.884E-05

	Greenhouse Gas		
	CO2	CH4	N2O
Emission Factor in lb/kgal	21,500	0.216	0.26
Potential Emission in tons/yr	807	0	0
Summed Potential Emissions in tons/yr	807		
CO2e Total in tons/yr	810		

Methodology

1 gallon of No. 2 Fuel Oil has a heating value of 140,000 Btu

Potential Throughput (kgals/year) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1kgal per 1000 gallon x 1 gal per 0.140 MM Btu

Emission Factors are from AP 42, Tables 1.3-1, 1.3-2, and 1.3-3 (SCC 1-03-005-01/02/03) Supplement E 9/98 (see erata file)

Potential Emissions (tons/year) = Throughput (mmBtu/hr)*Emission Factor (lb/mmBtu)*8,760 hrs/yr / 2,000 lb/ton

The CO2 Emission Factor for #1 Fuel Oil is 21500. The CO2 Emission Factor for #2 Fuel Oil is 22300.

Emission Factors are from AP 42, Tables 1.3-3, 1.3-8, and 1.3-12 (SCC 1-03-005-01/02/03) Supplement E 9/99 (see erata file)

Global Warming Potentials (GWP) from Table A-1 of 40 CFR Part 98 Subpart A.

Emission (tons/yr) = Throughput (kgals/ yr) x Emission Factor (lb/kgal)/2,000 lb/ton

CO2e (tons/yr) = CO2 Potential Emission ton/yr x CO2 GWP (1) + CH4 Potential Emission ton/yr x CH4 GWP (28) + N2O Potential Emission ton/yr x N2O GWP (298).

Appendix A: Emissions Calculations
Natural Gas Combustion Only
MM BTU/HR <100

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit Number: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

Facility	Heat input capacity (MMBtu/hr)		
Unit Heater Maintenance	0.13		
Storage Heater	0.18		
Unit Heater #1 Blending	0.18		
Unit Heater #2 Blending	0.18		
Unit Heater #3 Blending	0.18		
Make-up Heater	0.60		
Unit Heater #1 Water Treatment	0.40		
Unit Heater #2 Water Treatment	0.13		
Unit Heater #3 Water Treatment	0.13	HHV	Potential Throughput
Make-up Unit Water Treatment	0.95	mmBtu	MMCF/yr
Ind Water Heater	0.15	mmscf	
Total Heat Input Capacity	3.19	1020	27.4

	Pollutant						
Emission Factor in lb/MMCF	PM*	PM10*	direct PM2.5*	SO2	NOx	VOC	CO
	1.9	7.6	7.6	0.6	100	5.5	84
					**see below		
Potential Emission in tons/yr	0.0	0.1	0.1	0.0	1.4	0.1	1.1

*PM emission factor is filterable PM only. PM10 emission factor is filterable and condensable PM10 combined.

PM2.5 emission factor is filterable and condensable PM2.5 combined.

**Emission Factors for NOx: Uncontrolled = 100, Low NOx Burner = 50, Low NOx Burners/Flue gas recirculation = 32

	HAPs - Organics					
Emission Factor in lb/MMcf	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene	Total - Organics
	2.1E-03	1.2E-03	7.5E-02	1.8E+00	3.4E-03	
Potential Emission in tons/yr	2.874E-05	1.642E-05	1.026E-03	2.463E-02	4.653E-05	2.575E-02

	HAPs - Metals					
Emission Factor in lb/MMcf	Lead	Cadmium	Chromium	Manganese	Nickel	Total - Metals
	5.0E-04	1.1E-03	1.4E-03	3.8E-04	2.1E-03	
Potential Emission in tons/yr	6.843E-06	1.505E-05	1.916E-05	5.200E-06	2.874E-05	7.500E-05
					Total HAPs	2.583E-02
					Worst HAP	2.463E-02

	Greenhouse Gas		
Emission Factor in lb/MMcf	CO2	CH4	N2O
	120,000	2.3	2.2
Potential Emission in tons/yr	1,642	0.0	0.0
Summed Potential Emissions in tons/yr		1,642	
CO2e Total in tons/yr		1,652	

Methodology

All emission factors are based on normal firing.

MMBtu = 1,000,000 Btu

MMCF = 1,000,000 Cubic Feet of Gas

Emission Factors are from AP 42, Chapter 1.4, Tables 1.4-1, 1.4-2, 1.4-3, SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03

Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,020 MMBtu

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

The five highest organic and metal HAPs emission factors are provided above.

Additional HAPs emission factors are available in AP-42, Chapter 1.4.

The N2O Emission Factor for uncontrolled is 2.2. The N2O Emission Factor for low Nox burner is 0.64.

Emission Factors are from AP 42, Table 1.4-2 SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03.

Global Warming Potentials (GWP) from Table A-1 of 40 CFR Part 98 Subpart A.

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

CO2e (tons/yr) = CO2 Potential Emission ton/yr x CO2 GWP (1) + CH4 Potential Emission ton/yr x CH4 GWP (28) + N2O Potential Emission ton/yr x N2O GWP (298).

**Appendix A: Emissions Calculations
Roads**

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit Number: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

Unpaved Roads

The following calculations determine the amount of emissions created by unpaved roads, based on AP-42, Ch 13.2.2 (11/2006)

Parameter	PM	PM10	PM2.5	Source/Method
Ef = particulate emission factor (lb/VMT)	12.75	3.68	0.37	$= k * [(s/12)^a] * [(W/3)^b]$, Ch. 13.2.2, eqn (1a)
k = empirical constant (lb/VMT)	4.9	1.5	0.15	Table 13.2.2-2
a = empirical constant	0.7	0.9	0.9	Table 13.2.2-2
b = empirical constant	0.45	0.45	0.45	Table 13.2.2-2
s = surface material silt content (%)	8.9	8.9	8.9	See Table 13.2.2-1
W = mean weight of vehicles traveling the road (tons)	40	40	40	Provided by the source
VMT/yr = vehicle miles traveled per year	365	365	365	Provided by the source
PTE = Potential to Emit (ton/yr)	2.33	0.67	0.07	$= Ef \text{ (lb/VMT)} \times VMT/yr \times (1 \text{ ton}/2000 \text{ lb})$

Taking natural mitigation due to precipitation into consideration:

Parameter	PM	PM10	PM2.5	Source/Method
Eext = particulate emission factor extrapolated for natural mitigation (lb/VMT)	8.38	2.42	0.24	$= Ef * [(365-P)/365]$, Ch. 13.2.2, eqn (2)
P = number of days in a year with at least 0.01 in of precipitation	125	125	125	Based on Figure 13.2.2-1
PTE = Potential to Emit (ton/yr)	1.53	0.44	0.04	$= Eext \text{ (lb/VMT)} \times VMT/yr \times (1 \text{ ton}/2000 \text{ lb})$

Appendix A: Emissions Calculations
Welding and Thermal Cutting

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit Number: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

Process Welding	Number of Stations	Max. electrode consumption per station (lbs/yr)	EMISSION FACTORS* (lb pollutant/lb electrode)				EMISSIONS (lbs/hr)				HAPS (lbs/hr)
			PM = PM10	Mn	Ni	Cr	PM = PM10	Mn	Ni	Cr	
Stick (E7018 electrode)	3	310	2.11E-02	9.00E-04	0	0	7.47E-04	3.18E-05	0.00	0.00	3.18E-05

FLAME CUTTING	Number of Stations	Max. Metal Thickness Cut (in.)	Max. Metal Cutting Rate (in./minute)	EMISSION FACTORS (lb pollutant/1,000 inches cut, 1" thick)**				EMISSIONS (lbs/hr)				HAPS (lbs/hr)
				PM = PM10	Mn	Ni	Cr	PM = PM10	Mn	Ni	Cr	
Oxyacetylene	1	0.38	24	1.62E-01	5.00E-04	1.00E-04	3.00E-04	8.76E-02	2.70E-04	5.40E-05	1.62E-04	4.86E-04

EMISSION TOTALS

Potential Emissions lbs/hr	8.83E-02	3.02E-04	5.40E-05	1.62E-04	5.18E-04
Potential Emissions lbs/day	2.12	7.24E-03	1.30E-03	3.89E-03	1.24E-02
Potential Emissions tons/year	0.39	1.32E-03	2.37E-04	7.10E-04	2.27E-03

Methodology:

*Emission Factors are default values for carbon steel unless a specific electrode type is noted in the Process column.

**Emission Factor for plasma cutting from American Welding Society (AWS). Trials reported for wet cutting of 8 mm thick mild steel with 3.5 m/min cutting speed (at 0.2 g/min emitted). Therefore, the emission factor for plasma cutting is for 8 mm thick rather than 1 inch, and the maximum metal thickness is not used in calculating the emissions.

Using AWS average values: (0.25 g/min)/(3.6 m/min) x (0.0022 lb/g)/(39.37 in./m) x (1,000 in.) = 0.0039 lb/1,000 in. cut, 8 mm thick

Plasma cutting emissions, lb/hr: (# of stations)(max. cutting rate, in./min.)(60 min./hr.)(emission factor, lb. pollutant/1,000 in. cut, 8 mm thick)

Cutting emissions, lb/hr: (# of stations)(max. metal thickness, in.)(max. cutting rate, in./min.)(60 min./hr.)(emission factor, lb. pollutant/1,000 in. cut, 1"

Welding emissions, lb/hr: (# of stations)(max. lbs of electrode used/hr/station)(emission factor, lb. pollutant/lb. of electrode used)

Emissions, lbs/day = emissions, lbs/hr x 24 hrs/day

Emissions, tons/yr = emissions, lb/hr x 8,760 hrs/year x 1 ton/2,000 lbs

**Appendix A: Emission Calculations
Boiler #1 and Boiler #2**

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit No.: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

BOILERS OPERATING PARAMETERS

Emission Unit	HP	MMBtu/hr	Heat Capacity (Btu/scf)	Potential Throughput (MMcf/hr)
Boiler #1	350	11.7	1020	1.15E-02
Boiler #2	600	20.1		1.97E-02

EMISSION FACTORS

									GHGs		
Fuel Type	Units	PM	PM10	PM2.5	SO2	NOx	CO	VOC	CO2	CH4	N2O
Natural Gas	lbs/MMscf	1.9	7.6	7.6	0.6	100	84	5.5	120,000	2	2

Potential to Emit

Boiler #1								GHGs			
Fuel	PM	PM10	PM2.5	SO2	NOx	CO	VOC	CO2	CH4	N2O	CO2e
Natural Gas	0.10	0.38	0.38	0.03	5.02	4.22	0.28	6,029	0	0	6,065

Boiler #2								GHGs			
Fuel	PM	PM10	PM2.5	SO2	NOx	CO	VOC	CO2	CH4	N2O	CO2e
Natural Gas	0.16	0.66	0.66	0.05	8.63	7.25	0.47	10,357	0	0	10,419

Total PTE								GHGs			
	PM	PM10	PM2.5	SO2	NOx	CO	VOC	CO2	CH4	N2O	CO2e
Boilers #1&2	0.26	1.04	1.04	0.08	13.66	11.47	0.75	16,386	0	0	16,484

Note:

Emission Factors from AP 42, Chapter 1.4, Tables 1.4-1, 1.4-2, and 1.4-3, SCC #1-01-006-01, 1-01-006-02, 1-03-006-02, 1-03-006-03, and 1-01-006-04 (AP-42 Supplement D 3/98)

Emission Factors for NOx: Uncontrolled = 280 (pre-NSPS) or 190 (post-NSPS), Low NOx Burner = 140, Flue gas recirculation = 100 (See Table 1.4-1)

Additional HAPs emission factors are available in AP-42, Chapter 1.4

A = weight% ash in fuel, S = weight % sulfur in fuel

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,020 MMBtu

Potential Throughput (kgals/year) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1kgal per 1000 gallon x 1 gal per 0.140 MM Btu

Emission (tons/yr) = Throughput kgals per year x Emission Factor (lb/kgal)/2,000 lb/ton

Global Warming Potentials (GWP) from Table A-1 of 40 CFR Part 98 Subpart A.

Emission (tons/yr) = Throughput (kgals/ yr) x Emission Factor (lb/kgal)/2,000 lb/ton

CO2e (tons/yr) = CO2 Potential Emission ton/yr x CO2 GWP (1) + CH4 Potential Emission ton/yr x CH4 GWP (25) + N2O Potential Emission ton/yr x N2O GWP (298).

**Appendix A: Emission Calculations
Boiler #1 and Boiler #2**

Company Name: Metalworking Lubricants Company
Address City IN Zip: 1509 South Senate Avenue, Indianapolis, IN 46225
Permit No.: F097-32513-00139
Reviewer: Julie Alexander
Date: May 16, 2014

BOILERS OPERATING PARAMETERS

Emission Unit	HP	MMBtu/hr	Heat Capacity (Btu/scf)	Potential Throughput (MMcf/hr)
Boiler #1	350	11.7	1020	1.15E-02
Boiler #2	600	20.1		1.97E-02

EMISSION FACTORS

Fuel Type	Units	Cadmium	Chromium	Lead	Manganese	Nickel	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene
Natural Gas	lb/MMcf	1.1E-03	1.4E-03	5.0E-04	3.8E-04	2.1E-03	2.1E-03	1.2E-03	7.5E-02	1.80	3.4E-03

Potential to Emit

Boiler #1

Fuel Type	Cadmium	Chromium	Lead	Manganese	Nickel	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene
Natural Gas	5.53E-05	7.03E-05	2.51E-05	1.91E-05	1.06E-04	1.06E-04	6.03E-05	3.77E-03	9.04E-02	1.71E-04

Boiler #2

Fuel Type	Cadmium	Chromium	Lead	Manganese	Nickel	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene
Natural Gas	9.49E-05	1.21E-04	4.32E-05	3.28E-05	1.81E-04	1.81E-04	1.04E-04	6.47E-03	1.55E-01	2.93E-04

Total PTE

	Cadmium	Chromium	Lead	Manganese	Nickel	Benzene	Dichlorobenzene	Formaldehyde	Hexane	Toluene	Total
Boilers #1&2	1.50E-04	1.91E-04	6.83E-05	5.19E-05	2.87E-04	2.87E-04	1.64E-04	1.02E-02	2.46E-01	4.64E-04	0.26

Notes:

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,020 MMBtu

Potential Throughput (kgals/year) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1kgal per 1000 gallon x 1 gal per 0.140 MM Btu

Emission (tons/yr) = Throughput kgals per year x Emission Factor (lb/kgal)/2,000 lb/ton



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

100 N. Senate Avenue • Indianapolis, IN 46204

(800) 451-6027 • (317) 232-8603 • www.idem.IN.gov

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

SENT VIA U.S. MAIL: CONFIRMED DELIVERY AND SIGNATURE REQUESTED

TO: Michael Zielinski
Metalworking Lubricants Co.
1509 S Senate Ave
Indianapolis, IN 46225

DATE: June 25, 2015

FROM: Matt Stuckey, Branch Chief
Permits Branch
Office of Air Quality

SUBJECT: Final Decision
FESOP - Renewal
097 - 32513 - 00139

Enclosed is the final decision and supporting materials for the air permit application referenced above. Please note that this packet contains the original, signed, permit documents.

The final decision is being sent to you because our records indicate that you are the contact person for this application. However, if you are not the appropriate person within your company to receive this document, please forward it to the correct person.

A copy of the final decision and supporting materials has also been sent via standard mail to:
OAQ Permits Branch Interested Parties List

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178, or toll-free at 1-800-451-6027 (ext. 3-0178), and ask to speak to the permit reviewer who prepared the permit. If you think you have received this document in error, please contact Joanne Smiddie-Brush of my staff at 1-800-451-6027 (ext 3-0185), or via e-mail at jbrush@idem.IN.gov.

Final Applicant Cover letter.dot 6/13/2013



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We Protect Hoosiers and Our Environment.

100 N. Senate Avenue • Indianapolis, IN 46204

(800) 451-6027 • (317) 232-8603 • www.idem.IN.gov

Michael R. Pence
Governor

Thomas W. Easterly
Commissioner

June 25, 2015

TO: Fountain Square Branch Library 1066 Virginia Avenue Indianapolis IN

From: Matthew Stuckey, Branch Chief
Permits Branch
Office of Air Quality

Subject: **Important Information for Display Regarding a Final Determination**


Applicant Name: Metalworking Lubricants Co.
Permit Number: 097 - 32513 - 00139

You previously received information to make available to the public during the public comment period of a draft permit. Enclosed is a copy of the final decision and supporting materials for the same project. Please place the enclosed information along with the information you previously received. To ensure that your patrons have ample opportunity to review the enclosed permit, **we ask that you retain this document for at least 60 days.**

The applicant is responsible for placing a copy of the application in your library. If the permit application is not on file, or if you have any questions concerning this public review process, please contact Joanne Smiddie-Brush, OAQ Permits Administration Section at 1-800-451-6027, extension 3-0185.

Enclosures
Final Library.dot 6/13/2013


Mail Code 61-53

IDEM Staff	LPOGOST 6/25/2015 Metalworking Lubricants 097 - 32513 - 00139 final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING
Name and address of Sender	 Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

Line	Article Number	Name, Address, Street and Post Office Address	Postage	Handling Charges	Act. Value (If Registered)	Insured Value	Due Send if COD	R.R. Fee	S.D. Fee	S.H. Fee	Rest. Del. Fee
											Remarks
1		Michael Zielinski Metalworking Lubricants 1509 S Senate Ave Indianapolis IN 46225 (Source CAATS) Via USPS certified mail									
2											
3		Marion County Health Department 3838 N. Rural St Indianapolis IN 46205-2930 <i>(Health Department)</i>									
4		Indianapolis City Council 200 East Washington Street, Room E Indianapolis IN 46204 <i>(Local Official)</i>									
5		Mr. James A. Brightwell 2223 Churchman Ave Indianapolis IN 46203 <i>(Affected Party)</i>									
6		Marion County Commissioners 200 E. Washington St. City County Bldg., Suite 801 Indianapolis IN 46204 <i>(Local Official)</i>									
7		David Powell 2754 Napoleon St Indpls IN 46203 <i>(Affected Party)</i>									
8		Matt Mosier Office of Sustainability City-County Bldg/200 E Washington St. Rm# 2460 Indianapolis IN 46204 <i>(Local Official)</i>									
9		Robert Clark Taft, Stentinius, Hollister, LLP One Indiana Square, Suite 3500 Indianapolis IN 46204 <i>(Attorney)</i>									
10		Jennifer Schick Dept. of Code Enforcement – City of Indianapolis 1200 Madison Ave., Ste. 100 Indianapolis IN 46225 <i>(Affected Party)</i>									
11		Kevin Mouser IUPUI 980 Indiana Ave Rm 4421 Indianapolis IN 46202 <i>(Affected Party)</i>									
12		Lisa Laflin 200 E Washington St # 2160 Indianapolis IN 46204 <i>(Affected Party)</i>									
13		Mitra Parsapour 512 E New York St Indianapolis IN 46202 <i>(Affected Party)</i>									
14		Mr. Jim Simmons 2243 S Garfield Drive Indianapolis IN 46203 <i>(Affected Party)</i>									
15		Mr. Jim Forestal 1101 N Layman Ave Indianapolis IN 46219 <i>(Legislator)</i>									

Total number of pieces Listed by Sender	Total number of Pieces Received at Post Office	Postmaster, Per (Name of Receiving employee)	The full declaration of value is required on all domestic and international registered mail. The maximum indemnity payable for the reconstruction of nonnegotiable documents under Express Mail document reconstructing insurance is \$50,000 per piece subject to a limit of \$50, 000 per occurrence. The maximum indemnity payable on Express mil merchandise insurance is \$500. The maximum indemnity payable is \$25,000 for registered mail, sent with optional postal insurance. See Domestic Mail Manual R900, S913, and S921 for limitations of coverage on inured and COD mail. See International Mail Manual for limitations o coverage on international mail. Special handling charges apply only to Standard Mail (A) and Standard Mail (B) parcels.
---	--	--	--


Mail Code 61-53

IDEM Staff	LPOGOST 6/25/2015 Metalworking Lubricants 32513 (draft/final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING
Name and address of Sender	 Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

Line	Article Number	Name, Address, Street and Post Office Address	Postage	Handling Charges	Act. Value (If Registered)	Insured Value	Due Send if COD	R.R. Fee	S.D. Fee	S.H. Fee	Rest. Del. Fee
											Remarks
1		Johan & Susan 4409 Blue Creek Drive Carmel IN 46033 (Affected Party)									
2		Indiana Members Credit Union 5103 Madison Avenue Indianapolis IN 46227 (Affected Party)									
3		Fountain Square Branch Library 1066 Virginia Avenue Indianapolis IN 46203 (Library)									
4		William Beranek 6479 Robinsrock Dr. Indianapolis IN 46268 (Affected Party)									
5		Sacred Heart of Jesus Catholic Church 1530 Union St. Indianapolis IN 46225 (Affected Party)									
6		Jennifer Andres Ice Miller LLP One American Square, Suite 2900 Indianapolis IN 46282 (Affected Party)									
7		Dan Forestal State of Indiana House of Representatives Third Floor State House Indianapolis IN 46204-2251 (Legislator)									
8		Justin Moed State of Indiana House of Representatives Third Floor State House Indianapolis IN 46204-2251 (Legislator)									
9		Dolores Weis Improving Kids Environment 1915 W. 18th Street Indianapolis IN 46202 (Affected Party)									
10		Judith Essex Old Southside Neighborhood Association 1133 Church Street Indianapolis IN 46225 (Affected Party)									
11		Tom Dale Midwest Computer Accessories, Inc. 850 S. Meridian St. Indianapolis IN 46225 (Affected Party)									
12		Kevin Martin 133 West Market Street Indianapolis IN 46204 (Affected Party)									
13		Jeff Larmore Marion County Health Department 3901 Meadows Drive Indainapolis IN 46205 (Affected Party)									
14		Amanda Schafer 2851 Sensur Rd Indianapolis IN 46239 (Affected Party)									
15		Dan Fortune American Environmental Corp 8500 Georgetown Rd Indpls IN 46268 (Affected Party)									

Total number of pieces Listed by Sender	Total number of Pieces Received at Post Office	Postmaster, Per (Name of Receiving employee)	The full declaration of value is required on all domestic and international registered mail. The maximum indemnity payable for the reconstruction of nonnegotiable documents under Express Mail document reconstructing insurance is \$50,000 per piece subject to a limit of \$50, 000 per occurrence. The maximum indemnity payable on Express mil merchandise insurance is \$500. The maximum indemnity payable is \$25,000 for registered mail, sent with optional postal insurance. See Domestic Mail Manual R900, S913, and S921 for limitations of coverage on inured and COD mail. See International Mail Manual for limitations o coverage on international mail. Special handling charges apply only to Standard Mail (A) and Standard Mail (B) parcels.
---	--	--	--


Mail Code 61-53

IDEM Staff	LPOGOST 6/25/2015 Metalworking Lubricants 32513 (draft/final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING
Name and address of Sender	 Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

Line	Article Number	Name, Address, Street and Post Office Address	Postage	Handling Charges	Act. Value (If Registered)	Insured Value	Due Send if COD	R.R. Fee	S.D. Fee	S.H. Fee	Rest. Del. Fee
											Remarks
1		Rob 1836 Singleton St Indpls IN 46203 (Affected Party)									
2		Jeff McGuire PO Box 88696 Indy IN 46208 (Affected Party)									
3		Gene Parsley 2282 Union St Indpls IN 46225 (Affected Party)									
4		Jeff Stermerick Taft Stettinging & Hollister One Indiana Square #3500 Indpls IN 46204 (Affected Party)									
5		Judith Bridgewater 1134 S Capitol Ave Indpls IN 46225 (Affected Party)									
6		Tom Beck 1026 Hervey St Indpls IN 46203 (Affected Party)									
7		Allyson Roselee 1122 S Capitol Indpls in 46225 (Affected Party)									
8		Abraham Olson 1640 Union St Indpls IN 46225 (Affected Party)									
9		Lisa Laflin 200 E Washington #2160 Indpls IN 46204 (Affected Party)									
10		Jeff Veldhof 1458 S Meridian St Indpls IN 46225 (Affected Party)									
11		Darrell Unsworth 915 E Tabor Indpls IN 46203 (Affected Party)									
12		David Buchanan 602 S Meridian St Indpls IN 46225 (Affected Party)									
13		Christine Jade Concord Neighborhood Center 1310 S Meridian St Indpls IN 46225 (Affected Party)									
14		Kevin Martin 123 W. McCarty St. Indianapolis IN 46225 (Affected Party)									
15		Larry Janezic Sacred Heart of Jesus Catholic Church 1530 Union St. Indianapolis IN 46225 (Affected Party)									

Total number of pieces Listed by Sender	Total number of Pieces Received at Post Office	Postmaster, Per (Name of Receiving employee)	The full declaration of value is required on all domestic and international registered mail. The maximum indemnity payable for the reconstruction of nonnegotiable documents under Express Mail document reconstructing insurance is \$50,000 per piece subject to a limit of \$50, 000 per occurrence. The maximum indemnity payable on Express mil merchandise insurance is \$500. The maximum indemnity payable is \$25,000 for registered mail, sent with optional postal insurance. See Domestic Mail Manual R900, S913, and S921 for limitations of coverage on inured and COD mail. See International Mail Manual for limitations o coverage on international mail. Special handling charges apply only to Standard Mail (A) and Standard Mail (B) parcels.
---	--	--	--

Mail Code 61-53

IDEM Staff	LPOGOST 6/25/2015 Metalworking Lubricants 32513 (draft/final)		AFFIX STAMP HERE IF USED AS CERTIFICATE OF MAILING
Name and address of Sender	 Indiana Department of Environmental Management Office of Air Quality – Permits Branch 100 N. Senate Indianapolis, IN 46204	Type of Mail: CERTIFICATE OF MAILING ONLY	

Line	Article Number	Name, Address, Street and Post Office Address	Postage	Handling Charges	Act. Value (If Registered)	Insured Value	Due Send if COD	R.R. Fee	S.D. Fee	S.H. Fee	Rest. Del. Fee
											Remarks
1		John 12 E. Ray St. Indianapolis IN 46225 (Affected Party)									
2		Matt Gonzales 736-A Lexington Ave. Indianapolis IN 46203 (Affected Party)									
3		Carolyn Key 938 Elm Street Indianapolis IN 46203 (Affected Party)									
4		Celia Latz 1544 Carrollton Ave. Indianapolis IN 46202 (Affected Party)									
5											
6											
7											
8											
9											
10											
11											
12											
13											
14											
15											

Total number of pieces Listed by Sender	Total number of Pieces Received at Post Office	Postmaster, Per (Name of Receiving employee)	The full declaration of value is required on all domestic and international registered mail. The maximum indemnity payable for the reconstruction of nonnegotiable documents under Express Mail document reconstructing insurance is \$50,000 per piece subject to a limit of \$50, 000 per occurrence. The maximum indemnity payable on Express mail merchandise insurance is \$500. The maximum indemnity payable is \$25,000 for registered mail, sent with optional postal insurance. See Domestic Mail Manual R900, S913, and S921 for limitations of coverage on insured and COD mail. See International Mail Manual for limitations of coverage on international mail. Special handling charges apply only to Standard Mail (A) and Standard Mail (B) parcels.
---	--	--	---